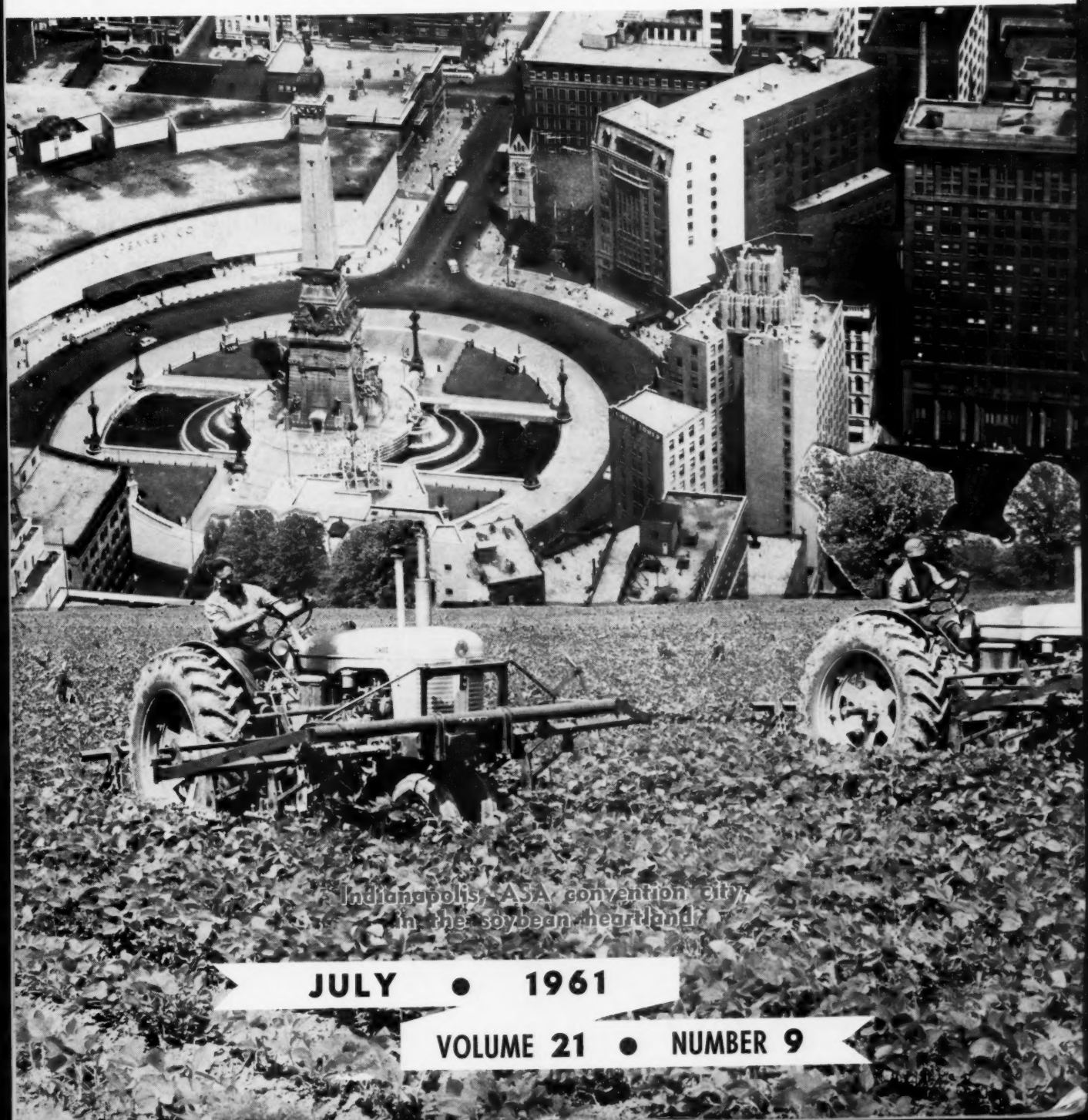
THE Soybean Digest



Indianapolis, ASA convention city, in the soybean heartland

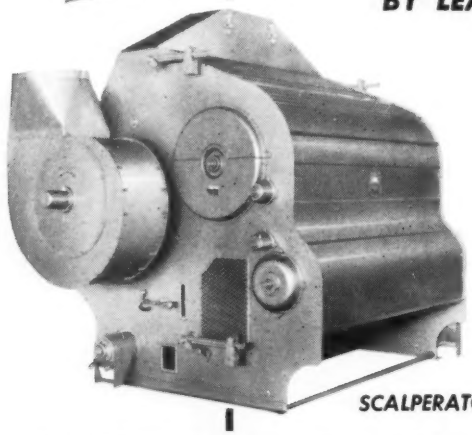
JULY • 1961

VOLUME 21 • NUMBER 9

APPROVED

BY LEADING HANDLERS AND PROCESSORS

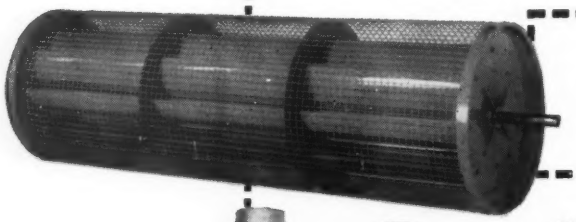
OF SOY BEANS



SCALPERATOR

FIRST SCALPING AND ASPIRATION

The Carter Scalperator does a good job of rough scalping *and* aspirating beans going directly to storage. It removes both coarse and light foreign materials. It also is a valuable machine to use on beans or grains when turned for cooling. Note that the Scalperator can be used on other grains without change of equipment. In capacity this is a "fast" machine. The Scalperator uses only rotary motion, thus does not vibrate.



The Basic Unit—Carter "Squirrel-Cage" Scalping Reel. Baffle plate construction retards flow of beans through the reel, insuring thorough rough scalping. The reel is self cleaning.

MILLERATOR

SECOND SCREENING AND ASPIRATION

The Carter Millerator, used before processing the beans, does a refined job of screening and aspirating. Its upper screen removes all material that is *larger in diameter* than the beans, and much of the material that is *longer*.

Its lower screen removes small seeds and sand. Controlled aspiration effectively removes light foreign materials. The Scalperator and Millerator are all-metal, require low power. Write for complete information . . . today.

SIMON-CARTER CO.
689 Nineteenth Ave. N. E. • Minneapolis 18, Minn.

EFFICIENT SCALPING AND ASPIRATION

THE Soybean Digest

REG. U. S. PAT. OFF.

Official Publication of American Soybean Association and Soybean Council of America, Inc.

HUDSON, IOWA

Vol. 21 **July, 1961** **No. 9**

IN THIS ISSUE

Editor's Desk 4
GEO. M. STRAYER

2 Million Tons More Fat in 1962? 5
J. C. A. FAURE

The News in Brief 7

Recent Progress in Soybean Disease Research 10
JOHN DUNLEAVY

USDA Award to Teeter of Peoria Lab. 12

Make Big Plans for ASA's 41st Convention 14

Processors, Crop Council to Meet 16

Soybean Council of America, Inc. 17

SBCA Staff Meets in Stockholm 17

Japanese American Soybean Institute 18

4 New Buses Tour Japan 18

Publications 19

Grits and Flakes 20

Washington Digest 22

2-Year 480 Extension? 22
GEORGE PETER

Market Street 23

New Products and Services 24

World Fats and Oils 25

June Markets 26

Good Start for Crop 27

In the Markets 28

THE SOYBEAN DIGEST

EDITOR ..... *Geo. M. Strayer*

MANAGING EDITOR ..... *Kent Pellett*

BUSINESS MANAGER ..... *Geo. McCulley*

DIRECTOR OF ADVERTISING AND CIRCULATION ..... *David B. Bramson*

OFFICES

Business, publication, advertising and circulation, Hudson, Iowa. TAylor 5-3296.

ADVERTISING REPRESENTATIVES:

Art Hutchison and David Hanley, Room 1517, 228 N. LaSalle, Chicago, Ill. STate 2-9211.

John K. O'Donnell, 153 Seaman Ave., New York 34, N. Y., LO 7-5010.

Published on the 10th of each month at Hudson, Iowa, by the American Soybean Association. Entered as second class matter Nov. 20, 1940, at the post office at Hudson, Iowa, under the Act of Mar. 3, 1879.

Forms close on 20th of month preceding.

Subscription rates—$3 per year; Canada and other members of the Pan American Union, $3.50, other foreign, $4. Single current copy 30¢, back copy 50¢. Subscriptions accepted from members only.

Refer all address changes, undeliverable copies and subscriptions to the Soybean Digest, Hudson, Iowa.

THE AMERICAN SOYBEAN ASSOCIATION

EXECUTIVE OFFICES: *Hudson, Iowa*

PHONE: *TAylor 5-3296*

CABLE ADDRESS: *Agriport, Hudson, Iowa*

PRESIDENT
Charles V. Simpson, Waterville, Minn.

VICE PRESIDENT
Hubert Baker, Dalton City, Ill.

EXECUTIVE VICE PRESIDENT AND SECRETARY-TREASURER
Geo. M. Strayer, Hudson, Iowa

ASSISTANT TO THE EXECUTIVE VICE PRESIDENT *David R. Farlow*

DIRECTORS: Hays Sullivan, Burdette, Ark; Jake Hartz, Jr., Stuttgart, Ark.; C. G. Simcox, Assumption, Ill.; Hubert W. Baker, Dalton City, Ill.; John H. Butterfield, Pana, Ill.; Ersel Walley, Fort Wayne, Ind.; Chester B. Biddle, Remington, Ind.; Joe W. Hammer, Des Moines, Iowa; Geo. M. Strayer, Hudson, Iowa; Howard L. Roach, Plainfield, Iowa; Harry Gatton, Jr., Rumsey, Ky.; John W. Evans, Montevideo, Minn.; Charles V. Simpson, Waterville, Minn.; Glen Myers, Memphis, Mo.; C. H. Acom, Wardell, Mo.; John Sawyer, London, Ohio; David G. Wing, Mechanicsburg, Ohio; Richard Smith, Tilbury, Ontario, Canada.

Objectives of the American Soybean Association include the bringing together of all persons interested in the production, distribution and utilization of soybeans; the collection and dissemination of the best available information relating to both the practical and scientific phases of the problems of increased yields coupled with lessened costs; the safeguarding of production against diseases and insect pests; the promotion of the development of new varieties; the encouragement of the interest of federal and state governments and experiment stations; and the rendering of all possible services to the members of the Association.

EDITOR'S DESK

. . . By GEO. M. STRAYER

HIGH TIME TO STEP UP SELLING In 1961-62, as never before, our industry must exert determined sales efforts if we are to continue to move our commodity into channels of consumption and keep it out of government storage. At a time when world price levels were holding steady to moving downward, we raised our soybean support price by approximately 25%. In so doing we increased our acreage of soybeans, and our expected production.

And in so doing we also invited increased production of competitive products throughout the world. A 25% increase in our prices means more profitable copra production, flaxseed production, palm nut and palm kernel production, peanut production, cottonseed production, and sunflower seed production in other places in the world. That means increased competition in the world markets. We are already seeing the depressing effects of high selling prices on exports. The trend will accentuate.

The American Soybean Association and the Soybean Council in their market development activities can create desire for more soybean products. But mere creation of desire is not sufficient. The businessmen of the soybean industry of the United States must put their best salesmen at work selling their products in the markets of the world. The jet age has made the world so small that it is not sufficient to think in terms of one small sphere of activity in one small area of the world.

The great need of the soybean industry of the United States today is for salesmen with order books tramping the market places of the world taking orders for and servicing the buyers of soybeans and soybean products. The promotion work of the two organizations is not paying off as it should because the sellers of our industry are not working at the followup selling.

If we are going to sell the 1961 crop of soybeans and keep it out of CCC hands we have the greatest challenge of our decade facing us—and it requires salesmen and not giveaway artists to do this job at a price the American people can pay.

CONTINUED EXPANSION ABROAD Attendance at the meetings of the International Association of Seed Crushers which were held in Stockholm in early June again reconfirmed the impressions of recent years.

U. S. soybeans and soybean products, when priced right, delivered in good quality, with determined efforts to supply the type and quality desired by a particular buyer, are the big future of the oilseed industry of Europe.

European processing plants will operate for increasing periods of time on U. S. soybeans. But fortunately for us those plants designed to operate on high-oil-content products like copra, peanuts and flaxseed will supply their local meal markets long before they reach their needs on vegetable oil. We need additional tonnages of meal here in the United States. Our market will not absorb the increasing quantities of oil. Soybeans produce only one-third to one-half as much oil per ton crushed as do the other raw materials. Both soybeans and oil will be exported in increasing quantities.

Each year greater recognition is given to the place of U. S. soybeans in the world food economy by the leaders of the European oilseed industry.

IMPORTANT FOR YOU TO ATTEND It has been many years since there were so many unknown factors in the markets for U. S. soybeans as during the present year. Just what is the size of the crop? How much acreage increase was really planted? What will 45¢-per-bushel increase in the soybean support price do to our markets? Where will we stand with competitive commodities in world markets? What role will the CCC play in the 1961-crop marketing program? Will soybeans, soybean oil, soybean meal, soy flour or other soy commodities be utilized in the Food for Peace program to an extent that will bolster markets? What effect will the African situation have on supplies of competitive products? What is the real situation in Red China?

This is a year when you will have to make decisions. They should be based on the best possible information available. It should be as up to date as is possible. There is one way to get it—*attend the 41st annual convention of the American Soybean Association.* To be held at the Claypool Hotel in Indianapolis, Ind., on Aug. 28 and 29, it will be jampacked with the best and latest information bearing on the 1961 crop, the markets, the prospects and the market potentials.

Make your reservations at the Claypool Hotel now. Tell them you will be attending the ASA convention. A few days and a few dollars spent in attendance may make the difference between right and wrong decisions this year. This convention you cannot afford to miss!

2 Million Tons More Fats in 1962?

By J. C. A. FAURE

Unilever, Ltd., London. From Mr. Faure's address before the International Association of Seed Crushers, Stockholm, Sweden

THE RAPID RISE in U. S. markets (this year) was undoubtedly set off by the report of crop disasters in China. Further encouragement was lent by the extraordinary rumors and counter-rumors of Spain's buying intentions for soya oil and by the decision of the new Administration to advance the soybean support price from $1.85 to $2.30 per bushel.

The favorable outlook for U. S. soybeans brought in a very large amount of speculation by the public in the USA. The open position published by the Commodity Exchange Authority disclosed how large were the speculative long holdings. The market has been in a highly nervous state as the violent day-to-day fluctuations show. Some day this long account must be liquidated, and it will be interesting to see if domestic and export demand will be able to absorb the offerings at the present (June 6-9) high levels. The Food for Peace plan and large allocations for charitable purposes have also been a great encouragement to small speculators.

From the various statistics one thing seems to emerge. *There is no shortage of oils and fats during 1961.* The short crops in China have been compensated by improved supplies elsewhere. I wonder if the short supplies in the USA are not to some extent due to a temporary withholding of soybeans from the market by the large number of small speculators.

Even in the United States in the face of great strength in soybeans, soy oil and cotton oil, a chink in the armor has become apparent. Lard production is on the increase again and it is interesting that during a recent period when cotton oil and soy oil advanced by 1¢ per pound lard actually dropped 3¢ per pound.

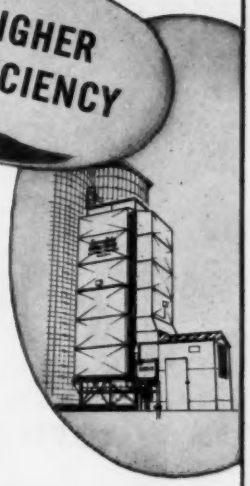
Now let me say a word about 1962. The new Administration in Washington has given every encouragement to a sharply increased production of soybeans this year, by raising the support price for new crop of soybeans from $1.85 to $2.30. The high prices ruling at a time when farmers had to decide what to sow has been an even greater incentive, and it is not improbable that we shall see a soybean crop in the United States next autumn of between 625 and 650 million bushels.

It seems more than probable that production in China this year will show a considerable improvement after last year's crop disaster. Reports have come in from Russia that it is planned to grow soybeans in the vicinity of Vladivostok in order to be less dependent on Chinese production.

Having regard to past experience and assuming reasonable crop conditions, we may well look forward to an increase in world production in 1962 of between 1 and 2 million tons. *It should not prove difficult for the world to absorb an increase of this nature,* both for consumption and rebuilding of stocks.

GET FASTER THROUGH-PUT HIGHER EFFICIENCY

With AEROGLIDE Soybean Drying



You can now have exacting bean-to-bean moisture control and hold consistently to those levels for peak plant efficiency and capacity. For makers of 50% protein meal this means highest efficiency in meal and hull separation, with minimum loss of oil in hulls.

Positive moisture control is possible because of much longer retention and deeper penetration in both drying and cooling sections, and at lower temperatures. This control, in turn, lets you get superior results in solvent extraction in both quantity and quality of oil produced as well as better protein control.

AND . . . don't overlook *these* money-making advantages of an Aeroglide Drier.

- Take in soybeans when prices are "right" — providing a continuous local market for beans at any moisture level.
- Store and ship safely for *short or long* periods — *with absolute minimum moisture pickup.*

Make a date to discuss the easy ownership and true economy of drying with an Aeroglide and reap the profits of our experience in the soybean industry.

Visit Booth 25 at the ASA Convention in Indianapolis

PLANTS & OFFICES

Emporia, Kansas — Aeroglide St. & South Ave. — Phone Dickens 2-1645

Raleigh, N. C. — 510 Glenwood Ave. — Phone TEmple 2-6422

Cable: Aeroglide

Aeroglide Corporation

CLIMATE CONTROLLED DRYING

CASE 800 COMBINE'S exclusive ON-THE-GO CONTROL of cylinder speed* and concave clearance adds up to an extra hour of harvesting capacity per day

UP HERE

is where you make money combining beans

. . . not down on the ground wasting time making adjustments

In heavy-yielding soybeans—in fact, in every combinable crop you grow . . . exclusive on-the-go controls keep you in the driver's seat—harvesting—not hopping up and down a ladder.

Case 800 owners say they can maintain top threshing efficiency all day long without stopping for adjustments. They're into the fields an hour earlier, work later, too, if need be . . . make all necessary setting changes *on-the-go* as the crop dries in the morning or toughens in the evening.

No more poor samples due to improper adjustments. No more skinned knuckles from stubborn sprockets or pulleys. No time-wasting chain-splitting. No more ladder climbing.

More and cleaner beans . . . less crackage

• 500-stroke-per-minute sickle cuts toughest growth fast and clean • Torsion-tube header suspension for precision alignment • Skid shoes and coil springs* allow header to float freely over the ground to get those low-growing pods • Extra-heavy 32-inch-wide rub-bar or spike-tooth cylinder handles heaviest crops • Extra-long, 5-step straw walkers with plenty of overhead clearance • Full-width sieves and easily-adjustable variable-speed fan for exceptional cleaning capacity in heavy, weedy crops • Big, 10-inch sump-bottom elevator with rubber flights handles beans fast yet gently • 80-inch front wheel tread, 66-inch rear tread, straddles 40-inch bean rows perfectly, makes handling easier in rough, muddy fields • Center-mounted grain bin and engine give proper balance for stability and traction.

*Optional

TERRIFIC DEALS NOW AT YOUR CASE DEALER

He's ready to make it really worth your while to switch to a 10, 12 or 14-foot Case 800. BUY OR LEASE (with option to buy).

CASE CROP-WAY PURCHASE PLAN
makes it easier for you to buy now, make later payments as your money comes in . . . or lease with option to buy after harvest.

CASE®

J. I. CASE CO. • RACINE, WIS.

1st in Quality for Over 100 Years

THE NEWS IN BRIEF

THE CROP, MARKETS AND OTHER ITEMS OF NOTE

1961 Bean Acreage Estimate

A total acreage planted to soybeans of **509,000 more than the government Mar. 1 planting intentions report** was estimated by the National Soybean Crop Improvement Council as of June 28. The Council's total of 26,935,000 acres is 2,660,000 more than the soybeans grown alone for all purposes in 1960.

The Council said 75% of its reporters rated the crop appearance and stand as good, and called the crop average in growth but with a tendency toward being late due to slow development.

USDA's July soybean acreage estimate is due July 10.

Late News About the Crop

As the Soybean Digest went to press moisture was badly needed for the soybean crop in northern Minnesota and North and South Dakota. Condition of the crop was good in the main soybean producing section of southern Minnesota but only fair in the north part of the state. Eastern Iowa was also short of moisture and rain was needed to germinate late-planted beans in heavy soils in Arkansas.

Growth was generally rapid in the north central area. Some planting was still to be done in Kansas and following other crops in the Midsouth and on the East Coast. (For more complete earlier details on the crop, see page 27.)

Outlook for Rest of Season

Soybean oil prices during the rest of the marketing year are expected to remain strong, averaging well above the 9.1¢ per pound during June-September 1960, USDA said the last of June. Strengthening cottonseed oil prices as a result of seasonally declining supplies should help maintain bean oil prices. Also, prospects for a large domestic use of soybean oil along with heavy exports of edible oils will provide some strength. The price differential between soybean and cottonseed oils is expected to remain small.

While soybean prices have dropped substantially in recent weeks, **prices through midsummer nevertheless will continue to average well above last year,** as bean crushers and exporters compete for the reduced supply.

USDA estimates total soybean crushings for the 1960-61 season at about 405 million bushels and exports at 141 million bushels, leaving carryover of old-crop beans Oct. 1 at a mere 5 million bushels.

Suggests Freer Trade in Fats, Oils

Ralph G. Golseth, president, Lauhoff Soya Co., Danville, Ill., in a speech before the International Association of Seed Crushers at Stockholm in early June, called on the six nations of the European Economic Community to allow U. S. soybean oil, cottonseed oil, and other oils and fats to enter their markets under freely competitive conditions.

"We (U. S. processors) ask no special favors for **oilseed products except that they enter under the same conditions as the raw material.** We are willing to compete on equal terms. As you know, we are not subsidized . . .

"European crushers have completely free access to our raw materials —we should have no duties on our oil to Europe.

Guy Chipperfield, president of the International Association of Seed Crushers, London, also speaking before the crushers congress, complimented officials of the U. S. Department of Agriculture and the American Soybean Association for their promptness in acting against the threat of contamination of foreign shipments of soybeans by crotalaria.

But Mr. Chipperfield said: "We are still not satisfied that the quality of U. S. beans cannot be improved still more."

Grant More Research Funds?

The outlook **appears bright for substantially increased funds for soybean research** under USDA's Agricultural Research Service, according to information from the House and Senate subcommittees on agricultural appropriations. The Senate subcommittee has approved $100,000 for basic physiology, nodulation research and soybean breeding; and an appropriation in the neighborhood of a million dollars is being set aside for general weed control.

The House subcommittee is reported as having included $1 million extra above the budget for ARS, with special mention of soybeans.

The North Central States Advisory Committee on Plant Pathology at its biennial meeting called for additional support for research on diseases of soybeans. The committee pointed out: "Considerable progress in soybean pathology has been made. **There is no early prospect, however, for the control of the destructive stem canker and bud blight diseases.** The same is true of bacterial blight, downy mildew, brown spot, brown stem rot and Rhizoctonia rot . . . We believe that increased research activity in pathology is essential to the continued successful production of this important (soybean) crop."

Some Reshuffling in USDA

Plans are being circulated by USDA proposing reorganization of the Agricultural Marketing Service grain division into eight districts instead of the present 35, **aimed chiefly at greater uniformity of grain inspection.** Where there is danger of lack of uniformity in soybean inspections, the new plans would also include soybeans, if the plans become effective.

USDA has also reshuffled the former Commodity Stabilization Service to transfer export operations to Foreign Agricultural Service. The move is aimed at giving FAS a stronger hand in all export operations, including the expansion of overseas markets and the P. L. 480 programs.

Approves Extension of P. L. 480

The House agriculture committee in late June approved a 3-year extension to Dec. 31, 1964, of Public Law 480, under which the export market programs for soybeans and other commodities are operated, according to press reports. The extension was included as part of a catch-all farm bill being drafted by the committee. The Administration had asked for authority to distribute up to $7.5 billion of surplus crops over a 5-year span, but the committee decided on a shorter extension without a ceiling on the amount.

It appeared as the Digest went to press that the Administration's omnibus bill had been junked by both Senate and House agriculture committees, and that some provisions in the bill might be reported out as separate bills. (For more earlier details see Washington Digest, page 22.)

Council Activities Planned

An arrangement has been concluded between the European Association for Animal Production, a scientific and advisory organization covering 21 European nations, the Soybean Council of America, Inc., and the U. S. Feed Grains Council for activities encouraging animal production and better nutrition. Activities in which the three groups will participate are being planned for 5 years ahead and include seminars and conferences in many different countries.

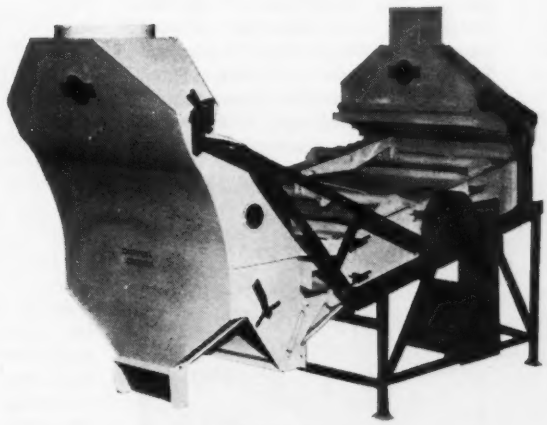
First such meeting will be the symposium on energy metabolism in Wageningen, Holland, Sept. 11-15, with scientific groups from Europe, the United States and Japan represented.

An increase of 8¢ per bushel for Ontario soybeans has been noted by K. A. Standing, secretary-manager of the Ontario Soya Bean Growers Marketing Board, Chatham, Ontario. The 8¢ rise was an **immediate reaction to the exchange rate gain of the U. S. dollar over the Canadian dollar.** "The Canadian price reflecting the U. S. price per bushel, rose from 3¢ under July futures to 5¢ over," said Mr. Standing.

for a CLEANER PRODUCT, faster at *less cost*... equipment by

FORSBERG is FIRST!

For over a quarter of a century FORSBERG dust-free seed cleaning equipment is recognized as the finest in the world. Operators have proven FORSBERG equipment maintenance-free . . . eliminating costly breakdowns. Today FORSBERG manufactures a complete line of seed cleaning equipment including vacuum separators, gravity separators, stoners, scalpers, leg-airs, and screeners all balanced to operate perfectly together for greater economy. Ask your local FORSBERG representative for a free estimate . . .



Forsberg Chippewa Screener

Package a perfect product all the time—get maximum purity. Chippewa Screener provides multiple cleaning of each particle. High-speed screen action with circular motion, 900 to 2000 RPM's. Custom installation to fit every need.

Batavia, New York
Don Gray

Sycamore, Illinois
Chuck Veeck

Arlington, Texas
Tom Vannerson

Owatonna, Minnesota
Fred Schuck

Kirksville, Missouri
Fred Schuck

Minneapolis, Minnesota
Bill Carter

Winnipeg, Manitoba
Cuthbert Company

Toronto, Ontario
Sullivan Equipment

Roanoke, Virginia
Morrison Engineering

Woodland, California
Baccei Brothers

Portland, Oregon
Larson Bardson

THE FORSBERG LINE
SEED & GRAIN CLEANING MACHINERY

FRED FORSBERG & SONS, INC.

Thief River Falls, Minnesota

• VACUUM and STANDARD GRAVITY SEPARATORS
• SCALPERS • STONERS • HULLER and SCARIFIER
• SCREENERS • LEG-AIR

Recent Progress in

Soybean Disease Research

By JOHN DUNLEAVY

Plant Pathologist, Crops Research Division, Agricultural Research Service, U. S. Department of Agriculture; and Iowa Agricultural and Home Economics Experiment Station.

DURING THE PAST few years considerable progress has been made in soybean disease research. Serious threats to the soybean industry have arisen and research workers have met the challenge. The outbreak of the soybean cyst nematode in North Carolina and in the Mississippi Valley set in motion a series of steps by state and federal authorities to check spread of the nematode and to control the pest on land already contaminated. Severe outbreaks of Phytophthora root rot in Ohio limited growing of susceptible varieties. These are only two outstanding examples of how rapidly the soybean disease situation changes. A few years ago the soybean cyst nematode and Phytophthora were not recognized in the United States but today they are major disease problems.

Diseases of plants are similar to diseases of man in many ways and they fall into the same groups. These groups are based on the type of organism that produces a disease. There are four principal groups: fungus diseases, produced by small, filamentous organisms sometimes called molds; bacterial diseases, produced by unicellular, microscopic organisms; virus diseases, caused by submicroscopic organisms; and nematode diseases caused by microscopic roundworms. Plant pathologists are actively engaged in research on soybean diseases in all of these areas and plant breeders are attempting to improve our present soybean varieties by developing resistance to some of the most important soybean diseases.

Figure 1. Soybean plants damaged by the soybean cyst nematode in Pemiscot County, Mo. Note the normal plants in the background. Inset, cysts on soybean roots that caused plant damage.

Diseases Caused by Fungi

Most diseases of soybeans are caused by fungi. Phytophthora rot, a disease in this group, has recently received considerable attention from soybean researchers. The disease was found first in northwestern Ohio in 1951. A. F. Schmitthenner and A. J. Suhovecky, of the Ohio Agricultural Experiment Station, reported that the disease occurred in three phases: a seed rot, a seedling damping-off and a root rot. The varieties Monroe and Blackhawk were resistant, but all other recommended varieties such as Hawkeye, Lincoln, and Harosoy were severely damaged. R. L. Bernard and M. J. Kaufman, working in Illinois, cooperated with P. E. Smith and A. F. Schmitthenner in Ohio to study the inheritance of resistance to Phytophthora rot.

They reported that resistance was controlled by a single dominant gene. This meant that this is one of the less difficult diseases with which plant breeders have to deal, but the development of resistant varieties, nevertheless, is a time-consuming operation that required a major shift of emphasis in the breeding program.

Phytophthora rot has also been observed in North Carolina, Illinois, Indiana, Arkansas and Mississippi. In Illinois the disease was more prominent on stems than on roots. Stem lesions were observed on late maturing lines in Ohio in 1957 and appeared as reddish-brown, sunken streaks.

The disease can readily be controlled by planting only resistant varieties. Most of the varieties grown in the South are resistant. In Indiana, A. H. Probst and K. L. Athow are transferring resistance to Shelby, Lindarin and several promising experimental strains. It is not known when these strains will be available for use. In Illinois, R. L. Bernard and D. W. Chamberlain are transferring resistance to several commonly grown susceptible varieties. They expect to have Phytophthora root rot resistant varieties in about 2 years.

Brown stem rot, another fungus

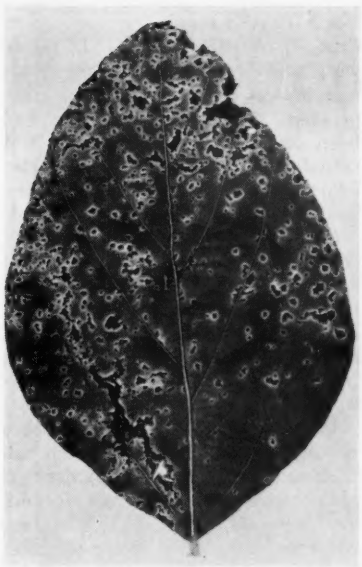


Figure 2. A soybean leaflet showing the striking symptoms of bacterial pustule disease.

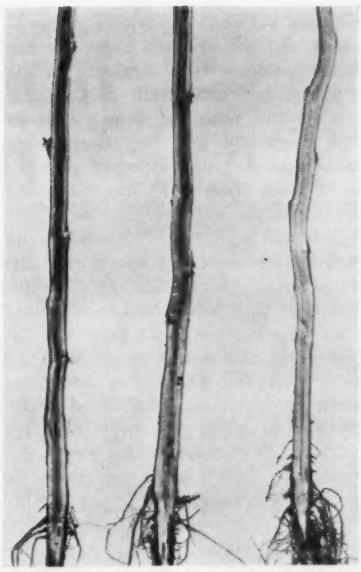


Figure 3. The two split soybean stems at the left were infected by the brown stem rot fungus. The stem at the right was not infected.

Figure 4. Left, plant with typical symptoms of bud blight. Right, a mature, healthy soybean plant grown a few feet from the plant at left.

disease in which the roots and stems rot (Fig. 3), is being studied in Illinois and Iowa. In Illinois 2,900 progeny from neutron-irradiated seeds were tested for brown stem rot resistance. None of the plants had complete resistance, but a few partially resistant plants are still under test.

Chamberlain has found a source of partial resistance to brown stem rot in the soybean germplasm collection. Chamberlain and Bernard studied the inheritance of this resistance and believe some resistance was transferred to other strains in crosses that they made.

C. R. Weber and J. M. Dunleavy are studying yield losses caused by brown stem rot in Iowa. Diseased Chippewa plants yielded 23% less than healthy plants in a test conducted in northern Iowa. Brown stem rot caused a 27% loss when the variety Ford was substituted in a similar test in central Iowa. These values indicate the importance of adequately controlling brown stem rot.

The disease occurs most frequently where soybeans are grown continuously, but even then there is little danger of the disease developing unless the spores of the disease-producing fungus are introduced from adjoining contaminated areas. It can be controlled by placing soybeans in a 3- or 4-year crop rotation.

Purple seed stain is another disease caused by a fungus called *Cercospora kikuchii*. Until recently it was believed that only this fungus could produce purple stains on soybean seeds. J. P. Jones, however, has recently demonstrated that other species of Cercospora which cause diseases of such crops as red clover, cowpeas and alfalfa, also cause purple staining of soybean seeds.

H. W. Crittenden, plant pathologist at the University of Delaware, has tested various practices for the control of purple seed stain. He has determined that Cercospora spores blown to soybean flowers during the period of bloom, germinate and infect the ovules that will eventually develop into seeds. Infection which results ultimately in purple-stained seeds occurs at this time. Crittenden has found that a fungicide spray applied during bloom will control the disease, but that later sprays have no effect on the amount of staining that occurs.

The varieties Lee and Hill, developed from a cross made by E. E. Hartwig of the Delta Branch Experiment Station in Mississippi, are resistant to purple seed stain. Lee is adapted to only the South.

The fungus disease called downy mildew is widespread in the soybean-growing regions of the United States. V. D. Pederson, of Iowa State University, found that outbreaks of downy mildew in the spring are largely determined by weather conditions. If contaminated seeds from a previously diseased crop are sown or good-quality seeds are sown in soil containing debris from previously diseased soybean crops, infected seedlings will develop. The infected seedlings will produce a profusion of spores 10-15 days after planting, but only if there is a rain or dew during this period. The spores are airborne to healthy plants and germinate during periods of rain or dew. The fungus can infect plants and form new crops of spores in only 8 days and entire fields of soybean plants may soon be infected.

Research pathologists in Iowa have discovered that downy mildew can be controlled with the fungicide maneb. Plants protected with maneb yielded 7% more than nonsprayed plants. This fungicide, however, is not recommended as a control meas-

John Dunleavy

ure because of high costs and difficulties in application.

Soybean research workers in Indiana, Iowa, Missouri and Mississippi are breeding improved varieties with downy mildew resistance. Soybeans immune from all known races of downy mildew have been found and this immunity is being utilized in breeding programs. Research workers hope that in years to come downy mildew will not be a problem.

Diseases Caused by Bacteria

Bacterial blight and bacterial pustule (Fig. 2) are the most frequently observed bacterial diseases. Bacterial blight is a problem only in the North, whereas bacterial pustule may occur in all soybean-growing regions of the United States. Resistance to both these diseases has been found and is being transferred to superior soybean varieties. The varieties Hood, Lee, Hill and Scott are resistant to bacterial pustule.

Diseases Caused by Viruses

Although bud blight is usually not observed as frequently as the other virus diseases, it can cause a total loss when severe (Fig. 4). K. L. Athow and J. B. Bancroft, of Purdue University, have reported that all seeds from plants infected at an early age can carry the virus and all plants developing from such seeds will be infected. They determined that plants infected before they flowered could transmit the virus in seeds but that plants infected after bloom could not.

There is no known source of resistance to bud blight. Research workers in North Dakota, Iowa, Illinois, Indiana, North Carolina and Missouri are cooperating in a search of the entire soybean germplasm collection for a source of resistance. Plant pathologists at Iowa State University are studying soybean mosaic. They have found that there is a considerable range in resistance among soybean varieties and are trying to find the most resistant type of soybeans. Soybean mosaic virus is transmitted in seeds and this aspect of the problem is also receiving attention.

Diseases Caused by Nematodes

Small, parasitic roundworms called nematodes can cause soybean diseases. The two most important types are the root knot nematode and the soybean cyst nematode. Diseases caused by nematodes occur primarily in the South.

H. W. Crittenden has studied the relation between the root knot nematode and the soybean plant. He has been particularly interested in the giant cells which form in root tissue at the point of attachment of the nematode and the consequent abnormal root development that results from feeding of the nematode on the roots.

Several species of Meloidogyne nematodes cause root knots and this complicates breeding of resistant varieties. Lines resistant to *M. hapla* may be obtained next, but this appears to be a much more difficult task. Laredo, which has some resistance to all species of Meloidogyne, has been the best resistant variety. The varieties Hill and Jackson have shown some resistance to root knot formation.

The soybean cyst nematode (Fig. 1) occurs primarily in the Mississippi Valley and in coastal areas of North Carolina and Virginia. J. P. Ross, C. A. Brim and B. E. Caldwell, of North Carolina State College, have done research on this problem. The variety Peking has been found to be resistant to the nematodes, and resistant varieties adapted to the infested areas are being developed.

Crop rotation is one means of controlling this nematode. The disease can also be controlled to a limited extent by use of soil fumigants but this method is expensive and the mechanics of contacting all cysts in a field with killing concentrations of fumigants are difficult.

Because of space limitations some recent soybean disease research has been omitted. Acknowledgment is made to the many research workers who responded to the author's request for assistance in preparation of this article.

USDA Award to Teeter of Peoria Lab

HOWARD M. TEETER, assistant director of the northern division of the Agricultural Research Service at Peoria, Ill., since November 1960, has been awarded the U. S. Department of Agriculture's superior service award for his achievements during his almost 20 years' research on vegetable oils such as soybean and linseed.

Dr. Teeter has published 61 research papers in leading American and English journals. He collaborated on 19 public service patents that have been granted and two that are pending. Of Dr. Teeter's papers, 23 are considered basic research reports.

One patent and two papers reported the conversion of fatty acids of vegetable oils to rubber replacements and were classified during World War II to prevent the information from falling into enemy hands. Polyester rubbers made from soybean oil were used in military aircraft and tanks and helped fill wartime shortages of natural rubber.

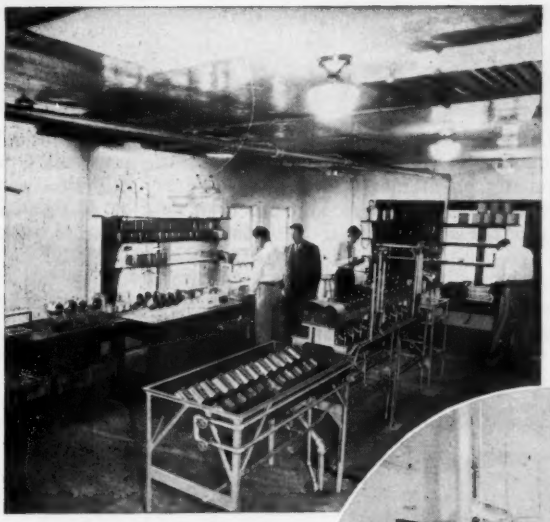
Dr. Teeter is co-inventor on a basic patent for polyamide resins, now manufactured by at least two companies. Products of polyamide resins are used to make a kind of "chemical concrete" that can be used to patch and resurface ordinary concrete. The resins also are used as a heat-sealing adhesive, such as is used in breakfast cereal packages, and for making gel paint which does not drip, run, or sag.

Howard M. Teeter

Varnishes, paints, and other coating materials are traditional products of vegetable oils, and the Peoria laboratory's search for new uses for farm products includes extensive research on oils and fatty acids in coating materials, under the leadership of Dr. Teeter.

Soybean and linseed oils are the sources of materials called "vinyl ethers" from which coating materials that adhere well to metals have been made in research under Dr. Teeter. The vinyl ether coatings resist acids, alkalis, organic solvents, and heat and are being tested by several industrial companies.

7 Chemical Laboratories To Serve You 7



Our Chicago laboratory is equipped with the most modern equipment for refining soybean oils; soybean products and feeds.

Our Des Moines laboratory has the latest equipment for refining oils; soybean products and feeds.

Our Oil Refining Department at Memphis has a capacity of 150 refinings daily. We also are equipped to analyze soybean products and all types of feeds.

LITTLE ROCK, ARK.
412 W. 7th St.

WILSON, ARK.
7 Union St.

CLARKSDALE, MISS.
75 Sunflower St.

CAIRO, ILL.
4007 Sycamore St.

CHICAGO 19, ILL.
1526 East 75th St.

DES MOINES, IOWA
3507 Delaware St.

Specializing in Marine Surveying and Inspection at Chicago Port

Official Chemists for the Chicago Board of Trade
Official Chemists for National Soybean Processors Association

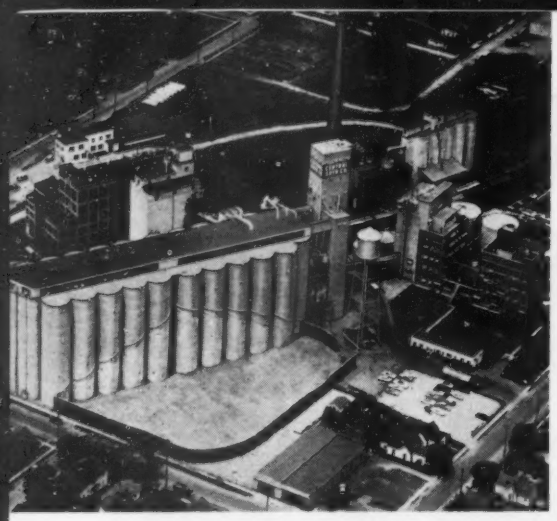
"Expert Analysis"

WOODSON-TENENT Laboratories

ANALYTICAL AND CONSULTING CHEMISTS

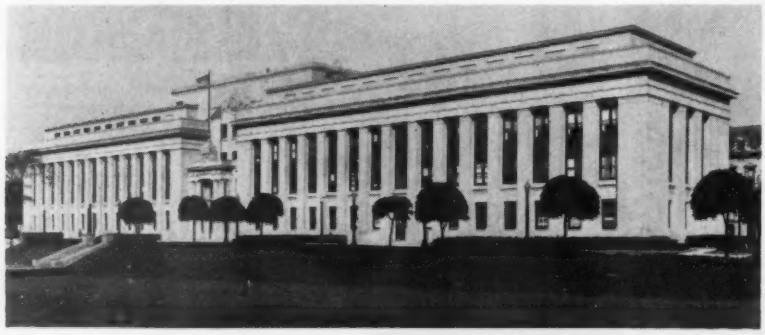
Phone: JA 5-6333 **Main Office: 265 S. FRONT ST.** **MEMPHIS, TENN.**

Serving the Soybean Industry Since 1935



INDIANAPOLIS is probably best known as the home of the Indianapolis Speedway where the 500-mile auto race is held annually on Memorial Day. The first 500-Mile Classic was run there 50 years ago, and has been held every year since except for some war years. The 45th Classic was this May 30.

CENTRAL SOYA'S soybean processing and grain merchandising plant at Indianapolis (left top) was acquired from Glidden Co. in September 1958. The plant has a storage capacity of 3 million bushels and a 14,000-bushel daily processing capacity. Soldiers and Sailors Monument (right), in the heart of the Indianapolis business district, is second only to the Washington Monument in height.



INDIANA'S War Memorial occupies five city blocks, was built at a cost of $15 million, and includes the beautiful limestone building that houses the national headquarters of the American Legion, shown above. Also in Indianapolis is the last home of James Whitcomb Riley, famed Hoosier poet, maintained as a shrine. There are 1,100 manufacturing plants in the city.

Make big plans for

ASA'S 41st CONVENTION

HAVE YOU made your hotel reservation yet for the 41st annual convention of the American Soybean Association, to be held at the Claypool Hotel in Indianapolis, Aug. 28-29?

In this frantic-paced age of the astronauts you need all the help you can get to keep abreast of the developments in your own industry to say nothing of the world at large. The 1961 ASA convention program is being put together with just that thought in mind.

Changes have come rapidly during the past year. The export programs of ASA and the Soybean Council have been stepped up, tremendously. A new Administration has come to power and that means vital changes at home and abroad that are not yet entirely spelled out. It's important that you attend the Indianapolis convention!

Claypool Hotel

There's an air conditioned room waiting for you at the Claypool, but don't wait too long. Phone, wire or write:

Claypool Hotel
Indianapolis, Ind.

Tell the hotel you are attending the American Soybean Association convention and they will have handsome and comfortable accommodations for you. But . . . don't delay!

The 41st convention will be ASA's first in Indianapolis, the capital of Indiana and the state's largest city —though we have met several times in the past in Indiana. Indianapolis is in the very heart of the soybean belt. Get out a road map and count the miles. You will be surprised to learn how close you are to the 1961 convention city.

The Convention Program

The ASA and Soybean Council export programs that now blanket the globe will again be fully covered for your information. President Howard L. Roach will report for SBCA; and Shizuka Hayashi, managing director of the Japanese American Soybean Institute, will report on the ASA export program in Japan that has become a model for many other commodity marketing programs.

Of special interest this year will be the appearance of Clifford R. Hope, former congressman from Kansas and one of the nation's great agricultural leaders. Mr. Hope will speak on the subject of commodity checkoff programs, a subject of growing interest to soybean people.

T. A. Hieronymus, University of Illinois professor of agricultural marketing, will bring you a price forecast on 1961-crop soybeans for the third year running. Dr. Hieronymus' price forecasts have become a popular feature of ASA conventions.

Other speakers confirmed to date and their topics:

Robert W. Howell, plant physiologist, U. S. Regional Soybean laboratory, Urbana, Ill.: "Some Physiological Comparisons of Soybeans and Corn."

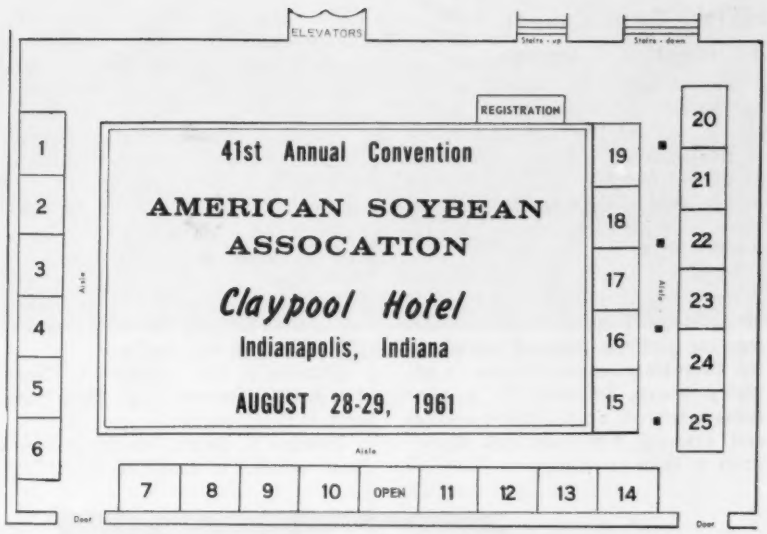
J. W. Calland, managing director, National Soybean Crop Improvement Council: "Report on the National Soybean Crop Improvement Council."

Joseph F. Spears, chief staff officer, control operations, plant pest control division, Agricultural Research Service, U. S. Department of Agriculture: "Latest Developments on the Soybean Cyst Nematode."

George E. Spain, agronomy extension specialist, North Carolina State College, Raleigh, N. C.: "Soybean Developments on the East Coast."

Walter M. Scott, assistant director, foreign research and technical programs division, Agricultural Research Service, U. S. Department of Agriculture: "Research Carried on Under P. L. 480 Funds for Soybeans."

Walter Klein, president, Bunge Corp.: "The European Common Market and What It Means to American Agriculture."



Ballroom - ASA meetings

FLOOR diagram shows exhibit booths and meeting room.

Exhibit Space

There is still some booth space left for exhibitors, but it is going fast. Do not delay sending in your reservation if you want to be sure of having space. All exhibits are on the mezzanine floor along with the general meetings, as shown in the diagram.

Wire, phone or write: Geo. McCulley, business manager, American Soybean Association, Hudson, Iowa.

The following firms had reserved space at press time:

4—Kennedy Car Liner & Bag Co., Inc.

6—Davenport Machine & Foundry Co.

7—Columbian Steel Tank Co.

8—Huntley Manufacturing Co.

11—Simon-Carter Co.

12—The Buhler Corp.

13, 14—The Soybean Council of America, Inc.

15—Seedburo Equipment Co.

19—Merrill Lynch, Pierce, Fenner & Smith, Inc.

20—A. T. Ferrell & Co.

21—Burrows Equipment Co.

24—V. D. Anderson Co.

25—Aeroglide Corp.

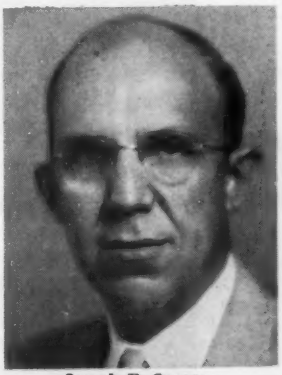
Some of Your Convention Speakers

Howard L. Roach

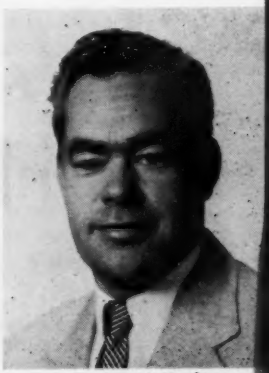
Ward Calland

T. A. Hieronymus

R. W. Howell



Joseph F. Spears



George E. Spain

NSPA, Crop Council, To Meet in Chicago

THE 1961 ANNUAL meeting of the National Soybean Processors Association and the 12th annual meeting of the National Soybean Crop Improvement Council advisory board will be held at the Edgewater Beach Hotel, Chicago, Aug. 3-4, R. G. Houghtlin, NSPA president, has announced.

The morning of Aug. 3 will be devoted to the annual NSPA business meeting and the opening session of the Crop Improvement Council's advisory board, followed by a joint noon luncheon, an afternoon session and evening reception and dinner open to both groups.

The regular NSPA directors' breakfast and meeting and the concluding session of the Council's advisory board will be held the morning of Aug. 4.

Guest speaker at the Aug. 3 noon luncheon will be John P. Duncan, Jr., Assistant Secretary of Agriculture, U. S. Department of Agriculture.

Aug. 3 afternoon speakers will include:

Dean McNeal, executive vice president, the Pillsbury Co., Minneapolis: "The Protein Picture."

Charles J. Orr, Anderson, Clayton & Co., Houston, Tex.: "The Fats and Oils Situation."

Howard L. Roach, president, Soybean Council of America, Inc.: "The World Market for Soybean Products."

Speakers at the National Soybean Crop Improvement Council advisory board meeting and their subjects:

"Objectives of the Soybean Breeding Program," H. S. Johnson, Beltsville, Md.

"Breeding for Disease Resistance," Edgar E. Hartwig, Stoneville, Miss.

"Improving the Composition of the Soybean," J. L. Cartter, Urbana, Ill.

"Current and New Approaches in Soybean Breeding," C. A. Brim, Raleigh, N. C.

"Evaluation of Progress in Soybean Breeding," C. R. Weber, Ames, Iowa.

"Effect of Light on Plant Growth," H. A. Borthwick, Beltsville, Md.

"Effect of Light on the Soybean Plant and Seed," R. W. Howell, Urbana, Ill.

"Nodulation Research Progress," H. W. Johnson, Beltsville, Md.

"Report on the Purdue Project," A. J. Ohlrogge and J. B. Peterson, Lafayette, Ind.

"Report on Iowa State Project," I. C. Anderson, Ames, Iowa.

"Report on Illinois Research Project," M. B. Russell, Urbana, Ill.

"Development of Crop Improvement Activities," J. W. Calland, Decatur, Ind.

"Open Discussion of Future Crop Improvement Efforts," R. W. Judd, Urbana, Ill.

there's a world of DIFFERENCE with a ... Clipper

Super G 2248-BD Grain Cleaner

the "CAN DO" cleaner that does a TWO WAY job!

As a fast market grain cleaner, the Clipper Super G 2248-BD handles up to 3500 bushels of corn, wheat, soybeans or pea beans per hour. Equally versatile as a precision Seed-Grain cleaner with capacities of 600—700 bushels per hour. Truly a world beater!

world-wide CLIPPER famous the world over

service to GRAIN and SEED industries since 1891

A. T. FERRELL & COMPANY

1621 WHEELER ST., SAGINAW 9, MICHIGAN

Phone SW 2-8723

INSIST upon Clipper supply—take away—and related equipment

BUCKET ELEVATORS • VIBRATING CONVEYORS

PNEUMATIC CONVEYORS • GRAIN DRIERS

DEBEARDERS • COB BREAKERS

Soybean Processing Plant to West Coast

A $2 MILLION soybean processing and oil refining plant will go into operation at Quincy, Wash., early next year, the Washington State Department of Commerce and Economic Development reports.

Columbia Vegetable Oils, Inc., has been formed by Lyle Kleinschmidt and Austin Fraser, both of Seattle, and could create a market for a $2½ to $3 million yearly cash crop in the Columbia basin, says the department. The plant is expected to consume close to 1 million bushels of beans in a year's run.

There is no commercial production of soybeans anywhere in the Pacific Northwest at the present time, and the nearest commercial soybean growing area is in the Midwest. Soybeans shipped from Midwest commercial producing areas into the Columbia basin for processing could be competitive with soybean products now being shipped to the Pacific Northwest markets, the department states.

GROUP at SBCA staff conference in Stockholm (see story below).

SOYBEAN COUNCIL OF AMERICA, INC.

Staff Meets in Stockholm

THE SOYBEAN Council's international staff training conference was held at Stockholm, Sweden, May 28-June 8 prior to the International Oilseed Crushers Conference at Stockholm.

The conference was attended by USDA's Foreign Agricultural Service officials and agricultural attaches.

The recently appointed Soybean Council country representatives were present and they are: Vasfi Hakman, Turkey; Bahma Sepaphour, Iran; Atta Hassan, Pakistan; William Ivanissevich, Peru; Reginald Wood, United Kingdom.

In the photo above, from left to right, sitting: Dominic J. Marcello, SBCA director for Italy; Jake L. Krider, vice president, SBCA; Clarence E. Eskildsen, U. S. agricultural attache, Bonn, Germany; Howard L. Roach, president, SBCA; Fred R. Marti, director of international operations, SBCA, Rome, Italy; Art Minor, assistant administrator management, FAS; Geo. M. Strayer, executive director, SBCA; and Vasfi Hakman, SBCA director for Turkey.

Standing: Mrs. Bente Lassen, secretary for Denmark SBCA office; Juan de Madariaga, SBCA staff assistant for France; Karl W. Fangauf, SBCA director for Germany; Ejvind Sondergaard, SBCA director for Denmark; Shizuka Hayashi, managing director, Japanese American Soybean Institute, Tokyo; William A. Luykx, SBCA director for Benelux; Atta Hassan, SBCA director for Pakistan; Robert W. Fischer, assistant to the president, SBCA; Bahma Sepaphour, SBCA director for Iran; Volorous Hougen, chief, foreign marketing branch, fats and oils division, FAS; Reginald I. Wood, SBCA director for United Kingdom; Franco Oddone, SBCA administrative officer for international operations, Rome; Javier de Salas, SBCA director for Spain; William O. Ivanissevich, SBCA director for Peru; Andre Tawa, SBCA director for United Arab Republic; Gonzalo Rivera, SBCA information officer for Spain; Jose M. Muentefering, assistant to the SBCA director for international operations, Rome; and Mrs. Itala L. Maraschin, SBCA administrative assistant for international operations, Rome.

Following the conference the Council's new country directors visited Germany, the Netherlands, Spain and Italy as part of their training programs before returning to their home offices. Dr. Ivanissevich will also visit the home office of the Soybean Council at Waterloo, Iowa, before returning to Peru.

FAS has recently approved establishment of a Council office in Yugoslavia, which will be opened soon.

Virendarasingh Appointed SBCA Director for India

F. H. NALLASETH, Soybean Council director for India, Bombay, for the past 15 months, has resigned effective July 1, the Council reports.

M. K. Virendrasingh, also of Bombay, has been named as Mr. Nallaseth's successor. Mr. Virendrasingh has been assistant director at the Bombay office.

The Council's India office is at Pallonji Mansion, 43 New Cuffe Parade, Bombay 5, India.

Dr. Ivanissevich Is New Peru Director

DR. WILLIAM O. IVANISSEVICH, the new Soybean Council director for Peru, will open an office in Lima soon after preliminary training at Stockholm, Rome, Madrid, Washington and Waterloo, Iowa.

Dr. Ivanissevich is a graduate of the College of Medicine at Buenos Aires, where he practiced medicine for 2 years.

W. Ivanissevich

Since 1955, he has operated a large irrigated farm south of Lima, where he has developed modern cropping and management practices. He is well known in both business and agricultural circles in Peru, including the fats and oils people.

Dr. Ivanissevich is deeply interested in improving human nutritional standards in Peru.

Establish Food Test Kitchen in Israel

AN AGREEMENT to establish a test kitchen for the development of soy foods was concluded between the Soybean Council of America and the school of nutrition of the Ministry of Education of Israel during the recent visit of Howard L. Roach, Council president, and J. L. Krider, vice president.

The test kitchen will serve as a center of training in the preparation of soy dishes not only in Israel but also for countries with which Israel is in close contact, in the Mediterranean, Asia and Africa.

Mr. Roach and Dr. Krider met

with representatives of the Israel oil crushers and mixed feed manufacturers and the Israel branch of the World Poultry Science Association, when plans were worked out for exchange of technical assistance and for an international symposium to be held in Israel in July.

Officers Meet With Oil, Feed People in Denmark

DURING THEIR recent visit to Copenhagen, Denmark, Howard L. Roach, Soybean Council president, and J. L. Krider, vice president, held two meetings with the oil and margarine interests and the mixed feed people. In the picture, left to right: President K. Moller, Dansk Sojakagefabrik A/S, Copenhagen; Director Aage Hansen, Det Ostasiatiske Kompagni A/S, Copenhagen; Ejvind Sondergaard, SBCA director for Denmark; and President Roach.

Bottle Soybean Oil For Sale in Spain

ABACO, one of the Spanish cooperators of the Soybean Council, has started to pack soybean oil in bottles to be sold directly to the Spanish public.

This is a direct consequence of the trip of Mr. Soler, manager of ABACO, to the United States last August under the Council's sponsorship. ABACO will launch its new product with a large newspaper and radio publicity campaign. This development opens tremendous possibilities for the sale of soybean oil in Spain.

Will Exhibit in Peru

THE SOYBEAN COUNCIL will exhibit at the National Trade Fair at Lima, Peru, in October, demonstrating the food uses of soybean oil and protein, it has been announced.

Wheat and one other U. S. commodity group in addition to soybeans will be represented at the fair.

Jolley Reelected Ontario Chairman

A. E. JOLLEY, Chatham, was reelected chairman of the Ontario Soya-Bean Growers Marketing Board at the initial meeting in Chatham recently.

Richard Smith, Tilbury, was reelected first vice chairman, and a member of the board of the American Soybean Association.

Frank Hyatt, Wheatly, was elected second vice chairman.

More Efficient Gains With Full-Fat Meal

UNIVERSITY OF Illinois tests indicate that full-fat soybean meal can increase the efficiency of hog gains, reports D. E. Becker, head of the swine division.

Becker included the full-fat meal in a standard ration and fed it to growing pigs until they weighed 115 pounds. He also fed the same ration, containing regular soybean meal, to similar pigs. Both rations provided 16% protein.

Pigs fed the full-fat meal gained 1.71 pounds daily and required 2.44 pounds of feed per pound of gain. Pigs fed the regular soybean meal gained at the same rate, but required 4% more feed per pound of gain.

Becker continued his comparison of the full-fat meal and regular meal after the pigs reached 115 pounds. But he dropped the protein level to 12% which is the usual recommendation. This time the pigs fed full-fat soybean meal required 12% less feed.

Full-fat soybean meal consists of dehulled soybeans which have been ground and heated, but from which the oil has not been extracted. It contains about 41% protein and 21% fat. Regular soybean meal contains about 1/10% fat.

Becker explains that he and his colleagues are investigating full-fat soybean meal to study its value in giving extra energy to hog rations. Energy costs more than any other ingredient in swine rations. It makes up at least 75% of the total ration cost.

Both carbohydrates and fat found in corn and soybean meal contribute energy in swine rations. But fat has twice the energy value of carbohydrates. And full-fat soybean meal has considerably more fat than regular soybean meal or corn.

Therefore, Becker wants to find out how much full-fat meal can be included in swine rations to increase efficiency of gains. The rations might contain more full-fat meal than if a regular meal were used.

More tests are necessary, however, to find the economic value of full-fat soybean meal as well as its effect on carcasses. Preliminary tests indicate that it may produce a fatter and softer carcass. But the average percentages of lean cuts did not differ greatly from those of pigs fed a regular soybean meal.

JAPANESE AMERICAN SOYBEAN INSTITUTE

4 New Buses To Tour Japan

FOUR NEW demonstration buses will soon be touring Japan telling the story of soybean products in human nutrition to Japanese housewives. The contract providing for the purchase and operation of the buses was recently signed between USDA's Foreign Agricultural Service and the American Soybean Association.

The buses will actually be operated by the four Japanese trade groups—the miso, tofu, shoyu, and fats and oils associations — and all costs of operation will be borne by them. Their operation will be supervised by the Japanese American Soybean Institute. This is the first contract in Japan under which demonstration buses will be operated by trade groups rather than quasi-governmental agencies.

The 12 original kitchen buses, which have been touring Japan since 1958 demonstrating the use of soybean and wheat food products under a joint contract between the Western Wheat Associates and the American Soybean Association, are still in operation. But they have been taken over by the Japan Nutritional Association for use in general nutritional education.

PUBLICATIONS

Useful reports, circulars, articles; for a complete list of experiment station publications and books relating to soybeans write Soybean Digest, Hudson, Iowa.

Kromer Traces Growth Of Soybean Acreage

THE GROWTH of soybean acreage since the early 1920's and the reasons therefore are traced by George W. Kromer in an article in the May 1961 Fats and Oils Situation.

Soybean acreage has risen sharply to an indicated 26.4 million for 1961 from a mere 1½ million acres in the mid-20's. Annual value of the crop is now over a billion dollars compared to $10 million 30 years ago.

Reasons for the expansion included the rapidly expanding markets for meal and oil, improved varieties, the increase in tractor farming and government programs which encouraged the switch from other crops into soybeans.

Trends in Soybean Acreage and Production, 1924-60. By George W. Kromer. Fats and Oils Situation, May 1961. Economic Research Service, U. S. Department of Agriculture, Washington 25, D. C.

Simple Vegetable Mixture Good Source of Protein

IN MANY countries it is impracticable to provide all the foods of animal origin necessary to furnish the major part of protein requirements. This situation tends to become worse as populations increase. Better use of vegetable protein is the only practical solution to the problem of protein malnutrition for many areas.

Since soybeans have been a human food for centuries, and because they are now an important article of commerce, they have received the greatest attention, to the neglect of more immediately available protein sources in some parts of the world, in the opinion of the authors.

They say there is no doubt that relatively simple vegetable mixtures can be prepared that are excellent sources of protein and other essential nutrients.

They describe INCAP vegetable mixtures developed by the Instituto Agropecuario Nacional of Guatemala and the Institute of Nutrition of Central America. INCAP vegetable mixture 9B can be produced at very low cost, and in the form of a thin gruel is highly acceptable in Central America. It has been favorably accepted commercially under the name "Incaparina."

Vegetable Protein Mixtures for Human Consumption. By N. S. Scrimshaw and R. Bressani, Institute of Nutrition of Central America and Panama. Proceedings of the Fifth International Congress on Nutrition, Vol. 20, No. 1, Part 3, Supplement No. 7, March 1961, pages 80-88.

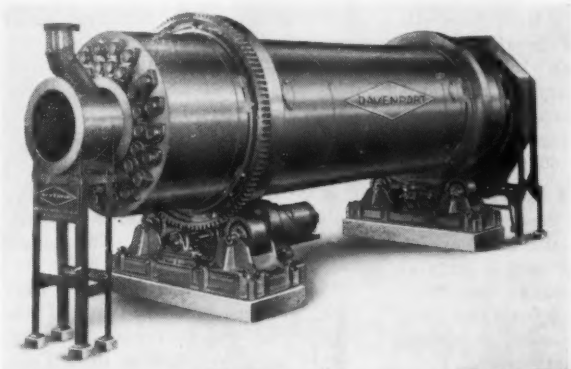
Analyze Effects of Urea On Oilseed Meal Markets

USE OF THE chemical urea in livestock feeds, to replace part of the high-protein oilseed meals, probably will grow somewhat but does not appear to be a serious threat to the meal market, according to a research report issued by the U. S. Department of Agriculture.

Urea is a low-cost chemical, high in nitrogen, from which protein is produced in cattle and sheep. Its use to replace part of the oilseed meals in rations of ruminants has become widespread, but there are still questions concerning the percentage of the meals that can be replaced by urea without harm to the animals. Very careful balancing of rations must be followed to avoid ill effects.

USDA researchers studied trends in marketing and use of urea in feeds to learn the probable effects on the markets for such feed ingredients as soybean meal, cottonseed meal, and linseed meal. They found use of urea is spreading, yet the general opinion—with some exceptions—is that substitution of the chemical for more than one-third of the meal in the ration is unwise.

The study is part of a national program of research to improve efficiency in marketing farm products. A copy of a preliminary report on the study, *Impact of Urea on Oilseed Meal Markets*, Marketing Research Report No. 472, may be obtained from the Office of Information, U. S. Department of Agriculture, Washington 25, D. C.



CONDITIONING OF CRACKED SOYBEANS

"DAVENPORT" offers a continuous rotary bean conditioner that has low initial cost, accurately controlled product temperature and moisture, plus extremely low operating and maintenance costs. Sizes available to accommodate any desired capacity.

Let our engineers discuss your bean conditioning problems with you. Send for our Catalog "D"—or for quick reference consult your Chemical Engineering Catalog.

DAVENPORT MACHINE AND Foundry Company
A DIVISION OF MIDDLE STATES CORPORATION
Davenport, Iowa, U.S.A.

DAVENPORT
PRESSING — DRYING and COOLING Equipment
Continuous DeWatering Presses
ROTARY DRYERS Steam Tube, Hot Air and Direct Fire
Atmospheric DRUM DRYERS
ROTARY COOLERS Water and Air

Thomas L. Daniels, left, chairman of the board of Archer-Daniels-Midland Co., and Richard M. Nicholsen, representing the research department, break ground for ADM's new central research laboratory. Nicholsen is business manager of the laboratory.

ADM Is Building New Central Research Lab

Archer-Daniels-Midland Co's. new central research laboratory is pledged to the quest for better foods, fibers and chemicals for human progress.

John H. Daniels, ADM president, speaking at ground breaking ceremonies in suburban Bloomington, where the laboratory will be located, said the company has contributed much in these fields since its founding nearly 60 years ago.

Mr. Daniels called construction of the new laboratory the most significant step taken by the company in the past decade. He said it emphasizes ADM's increasing concentration on products born from research. The company is a leading processor of chemicals and agricultural commodities.

The new science facility will be located on a 73-acre tract overlooking the Minnesota River valley. It will bring together ADM's research, technical service and engineering departments and scientific and technical libraries. Completion is scheduled for the fall of 1962.

ADM, with 100 plants, elevators and mines in the United States and Canada, also maintains research facilities at Newark, N. J., Evendale, Ohio, and Los Angeles, Calif.

Please mention the Soybean Digest to our advertisers.

Cornelsen Heads Purina International Division

Paul F. Cornelsen, central division production manager for the **Ralston Purina Co.,** has become a vice president of the company's international division, according to Hal Dean, Purina vice president and president of the international division.

The division has manufacturing plants in Central America, South America and Europe. Mr. Cornelsen will continue to headquarter in St. Louis. He took up his new duties July 1.

Paul F. Cornelsen

Several changes in Purina's production personnel in the United States, all effective July 1, were announced at the same time.

E. G. Hotchkiss, western division production manager, replaces Mr. Cornelsen as central division production manager. R. E. Rowland, Jr., manager of the St. Louis plant, becomes the new western division production manager.

Production manager of the newly created south central division will be H. S. Farmer, manager of the Purina plant at Louisville, Ky. All divisional production managers headquarter at the company's general office in St. Louis.

A. V. Couch, manager of the Iowa Falls, Iowa, plant, becomes manager at Kansas City. W. R. Harrington, superintendent at Iowa Falls, becomes manager there. L. E. Pedrick, Jr., superintendent of the Memphis, Tenn., soybean plant, becomes superintendent at Iowa Falls.

J. W. Anderson, superintendent at the New Madrid, Mo., soybean plant, becomes superintendent of the Memphis soybean plant. R. B. Lovelace, process supervisor at New Madrid, becomes superintendent there. W. J. Sullivan, office manager at the St. Louis plant, becomes manager of that plant.

Central Soya Opens Office in Rotterdam

The opening in Rotterdam, Holland, of **Central Soya's** first overseas office, and the naming of Richard E. Burket as its European representative were announced by D. W. McMillen, Jr., president of Central Soya, Fort Wayne, Ind.

Mr. McMillen said: "Our company's steadily expanding trade with other countries throughout the world makes it advisable that we establish our first overseas office at this time."

Richard E. Burket

Mr. Burket has been with Central Soya since January 1955, and has had extensive experience in Central Soya's formula feed, grain, and soybean meal and oil departments. In Europe, he will work with all of Central Soya's divisions.

Hubbard Sales Manager For Ross Machine Co.

Appointment of Rex Hubbard as sales manager of the **Ross Machine & Supply Co., Inc.,** Oklahoma City, has been announced by Henry Stark, executive vice president and general manager.

Rex Hubbard

Previously, Mr. Hubbard was a sales manager with the Strong-Scott Co. and district manager of their Kansas City office.

Langston Bag Appoints Holcomb Sales Manager

Langston Bag Co., Memphis, Tenn., has announced the appointment of Dewitt T. Holcomb as sales manager of the company. Mr. Holcomb has been associated with Langston Bag since 1950 as a salesman covering Arkansas and parts of Louisiana and Missouri. He was originally from Tate, Ga., and played football with Georgia Tech.

D. T. Holcomb

Walter Birdsong, Jr., Little Rock, Ark., has been appointed to cover Mr. Holcomb's territory and will make his headquarters in Little Rock.

Farlow Takes Position With Farmer City Grain

David R. Farlow, for the past 2½ years assistant to the executive vice president of the American Soybean Association at Hudson, Iowa, has accepted a position with **Farmer City Grain Co.,** Farmer City, Ill., effective July 1.

Mr. Farlow will be in charge of food soybeans for export for Farmer City Grain Co., which looks forward to expanding this business during the coming year. Farmer City Grain Co. has a contract with Mitsui & Co., worldwide export-import firm with head offices in Tokyo, Japan, for export of food beans to Japan. The firm exported over 1 million bushels to Japan last year, and also does some exporting to some other countries. Lew West is owner and manager of the Farmer City firm.

David R. Farlow

Mr. Farlow, while he was assistant to Geo. M. Strayer, ASA executive vice president, made four trips to Japan on Association business. He was in charge of the soybean exhibit of the Soybean Council of America at the U. S. Trade Fair at Madras, India, in 1959, and made a round-the-world tour in behalf of market development work for soybeans and soybean products the same year.

Ralston Purina Co. has acquired half interest in an existing Italian feed company. The new company is to be known as Globo-Purina, according to an announcement by Donald Danforth, chairman of the Ralston Purina Co. board. The feed manufacturing plant is at Treviso, Italy.

Joseph W. Gorman, who has been in charge of soybean meal sales for **Archer-Daniels-Midland Co.** in Chicago, has been transferred to ADM's soybean merchandising office in Decatur, Ill., as a senior trader. All soybean meal sales formerly handled by him in Chicago also have been shifted to Decatur. Mr. Gorman joined ADM in 1934.

Capital City Products Co., Columbus, Ohio, announces the appointment of Charles V. Gridley, Jr., as sales manager of the company's oil and shortening products, succeeding E. J. Keefe, who retired June 1. For the past 5 years he has served as district sales manager of the New England area for the firm.

A. J. Mills, Stamford Cotton Oil Co., Stamford, Tex., has been elected president of the **National Cottonseed Products Association,** nationwide organization of the cottonseed processing industry.

American Liberty Tank Terminals, Ltd., New Orleans, La., has announced the appointment of Philip J. Wallach to the new post of vice president in charge of New York operations, and of Marcel Randon to the new post of vice president in charge of terminal operations.

D. W. Tyler Co., Danville, Ill., representative for **Simon-Carter Co.** in Illinois and Indiana since early 1960, announces the appointment of Kenneth E. Bratney as a partner in the firm. Mr. Bratney was formerly vice president of Reid-Strutt Co., Portland, Ore., and for the past 12 years has been involved in sales and plant design work for feed, seed and grain milling facilities in the Pacific Northwest.

DEPENDABILITY

IN BAGS FOR YOUR SOYBEAN MEAL

For safe shipment—low cost—in bags easy to fill, close, stack and store... always insist on *Chase* dependability. Make a single call, order any or all—any type, any size, any quantity.

CHASE MULTIWALL PAPER CHASE COTTON
CHASE BURLAP

CHASE BAG COMPANY

General Sales Offices
155 Lexington Avenue, New York 17, N. Y.

32 Bag Plants and Sales Offices coast to coast—a Nationwide Staff of Bag Specialists.

Over 100 Years of Bag-Making Progress.

2-Year 480 Extension?

By GEORGE PETER

Washington correspondent for the Soybean Digest

PRESIDENT KENNEDY'S bold new idea on farm policy is considered dead for this year—and possibly for all time. By "new" we mean chiefly the idea that producers of farm products should be given additional government tools to enable them to exercise greater management of their production for marketing purposes.

The remainder of the omnibus bill proposals are mostly traditional. These include price supports but they are higher, mainly for the grains. But the higher supports are to be paid for by producer acceptance of tighter production controls to hold down the surpluses.

At least a 2-year extension of the P. L. 480 program with authorization for about $3 billion was expected to have very little trouble.

Near press time, the President was slated to get the majority of his major non farm proposals. There was also much talk that efforts would be made in the final debates to restore the "supply management" or "New Frontier" provisions but very few believed it could be done.

Marketing Agreements?

Only one key portion of the New Frontier farmer management ideas was left for a final try before Congress as a rewrite of the bill left the House agriculture committee. This section would give the Secretary of Agriculture authority to initiate marketing orders on all but wheat, tobacco, rice, cotton, peanuts, wool, mohair and sugar.

Soybeans were not among the crops specifically exempted. A big difference in the new marketing order proposal: The order would apply to the growers that produce the commodity instead of handlers and sellers as under present law.

However, under present plans by the new Administration to encourage greater production of soybeans and other edible oil crops, there appears to be little need in the near future for consideration of soybean marketing orders—unless producers want greater control of the flow of soybeans to buyers.

1961-62 Season?—It's Early Yet

On the best we can find out—it is advisable to remember that it is still early in the season. The new bigger crop was expected several months ago, starting with the increase in price supports for beans this season and the additional acreage turned to beans as a result of unpredictable weather and cutbacks on grains.

You have several first estimates of crop production this year, including the USDA official estimates. These are all necessary for both government, the producer, and private industry. Regardless how the estimates differ it is necessary to have working estimates. Revisions will follow as we head deeper into the season.

For the time being—take your pick. They are all bullish as we have been predicting in this space for several months. By next issue, through talks with government experts and private estimators, we will have firmed up, we hope, a more stable report on prospects than we feel is now possible.

Briefly: The most that officials will stand on at the moment is a prediction of larger exports of both beans and oils and continued high domestic use. USDA hasn't firmed up its prospects based on the July crop report yet and refuses to put out wild guesses that might only confuse the market at this point.

Price Support Through Co-ops

Price support on soybeans to cooperatives has as its aim to help producers gain greater bargaining power—particularly in situations where supply might be either too big or too tight or demand great. But from all we can learn from looking at the record, the new element in marketing is also going to call for additional decisions by the grower.

First to remember—getting price support through a cooperative won't be cut and dried. In plain language, cooperatives will have to submit proof that they are genuine producer co-ops. The co-op will have to apply for approval by USDA and submit copies of the co-op's charter, marketing agreements, and any other information Washington wants to establish eligibility.

Next—the producer will have to make the decision whether he wants to obtain a loan or purchase agreement through the co-op. The new rules are permissive, not mandatory. The producer, if he wishes, may obtain a loan or purchase agreement in the same manner as in the past.

Welcome

Members of The American Soybean Association to Indianapolis and The Claypool Hotel.

Headquarters for the

41ST ANNUAL A.S.A. CONVENTION

August 28-29, 1961

COMPLETELY AIR CONDITIONED

The CLAYPOOL Hotel

"The Doorway to Hoosier Hospitality"

INDIANAPOLIS, INDIANA

Whether you stay a day or a week you're sure to enjoy the Hoosier CLAYPOOL hospitality—delicious food, unexcelled service, comfortable newly decorated rooms, will make your visit one to remember.

Recommends Permanent Farm Market Program

A GOVERNMENT-INDUSTRY task force has recommended to Secretary of Agriculture Orville L. Freeman that the foreign agricultural market development program be expanded and made permanent, the U. S. Department of Agriculture has announced.

The task force said that while the United States leads the world in agricultural production, "our efforts to improve marketing have not begun to keep pace with our production efforts."

The group made its report following a detailed study of the foreign market development work currently being carried out with P. L. 480 financing. In that program, U. S. associations representing producers and processors of agricultural products have played a major role in market development abroad in cooperation with the government. There are now more than 60 such cooperating associations operating in more than 50 countries.

The task force recommended that to the extent that foreign currencies accruing under P. L. 480 are insufficient, regular dollar appropriations be provided; and that in the expansion of the program priority be given to countries and commodities that offer the greatest promise of increased dollar exports.

The task force also recommended that established market development projects be financed for periods up to 5 years in advance, instead of the present 3 years, and that Congress appropriate the funds to permit this longer-term financing.

Geo. M. Strayer, American Soybean Association executive vice president, and Robert W. Fischer, assistant to the president, Soybean Council of America, were members of the task force.

Copies of the task force report may be obtained from Foreign Agricultural Service, U. S. Department of Agriculture, Washington 25, D. C.

Smith Is Acting Head USDA Marketing Service

SECRETARY of Agriculture Orville L. Freeman has announced the appointment of S. R. Smith as acting administrator of the Agricultural Marketing Service of the U. S. Department of Agriculture.

Mr. Smith moves up to the new post after 15 years service as director of USDA fruit and vegetable marketing activities.

He succeeds O. V. Wells, who retired as AMS administrator on May 31 to go with the Food and Agriculture Organization of the United Nations as assistant director-general, in charge of the economics department. Mr. Wells will be at the FAO headquarters in Rome.

Kaiser to S. Howes

Frank Kaiser, with headquarters in Tulsa, Okla., will be responsible for S. Howes Co. sales in the states of Oklahoma and Arkansas. He attended Missouri Valley College and has had 9 years of experience in all phases of the grain and feed business.

- MARKET STREET -

We invite the readers of THE SOYBEAN DIGEST to use MARKET STREET for their classified advertising. If you have processing machinery, laboratory equipment, soybean seed, or other items of interest to the industry, advertise them here. Rate 10¢ per word per issue. Minimum insertion $2.00.

CHAROLAIS BULLS. COME SEE THEM or write Bard Seldon, Tunica, Miss.

PRODUCING ONE VARIETY OF MISSISsippi certified Rebel soybean. Come see or order seed early. Bard Selden, Tunica, Miss.

STEEL STORAGE TANKS: 10—30′ DIA. X 30′, 160,000 gals.; 2—28′ dia. x 19′6″, 90,000 gals.; 2—24′ dia. x 20′, 65,000 gals.; 7—18′ dia. x 30′, 55,000 gals.; 4—15′6⅝″ dia. x 16′1″, 22,500 gals. H. Loeb & Son, 4643 Lancaster Ave., Philadelphia 31, Pa.

FOR SALE—WHIZZER BAGGING CONveyors, Richardson scales, Union Special, Fischbein sewing heads, 1- to 7-ton square bins, welded spouting and elbows. Winborn Mill Equipment Service, Williamsburg, Iowa.

MODERN REBUILT GUARANTEED
ANDERSON & FRENCH
SCREW PRESSES
FOR
SPECIFIC OIL SEEDS
PITTOCK & ASSOCIATES
GLEN RIDDLE, PA.

PRATER 75 H.P. DUAL SCREEN PULverizer. Also 100-lb. Richardson meal scale and Union Special 12-inch belt sewing machine. Ray L. Jones, 1923 Hayselton Drive, Jefferson City, Mo.

WANTED: CHEMICAL ENGINEER. OPportunity for a man having a B.S. degree with major in chemical engineering, and from 2 to 5 years experience in industry. Work involves engineering studies and improvements on existing and new processes for wide range of soybean products. Opening with large, diversified soybean processor. Address Box 158C, the Soybean Digest, Hudson, Iowa.

WE MANUFACTURE STEEL ELEVATOR legs, screw conveyors, pit screws, valves, elbows, piping, collectors, enclosed distributors, etc. Write for catalog and prices. Creamer Sheet Metal Products, London, Ohio.

GRAIN STORAGE AT 13½¢ PER BUSHEL. We have a few all-steel storage tanks available within 500 miles of Kansas City—complete, erected on your site at 13½¢ a bushel. Write Allied Tank Co., 1207 Commerce Trust Bldg., Kansas City, Mo. HArrison 1-0282.

FOR SALE—ANDERSON EXPELLERS and French screw presses, cookers, driers, 5-high, 48-inch crushing rolls, 36-inch attrition mills, sewing machines, hammermills, cracking rolls, filter presses. Ray L. Jones, 1923 Hayselton Drive, Jefferson City, Mo.

BEAT YOUR TOUGH SOYBEAN STALK PROBLEM

with a

HESSTON

STRAW CHOPPER

on your combine

- **SPEED UP PLOWING**
- **REDUCE TILLAGE**
- **ENRICH YOUR SOIL!**

Your tough-soybean-stalk problem can be turned into real benefits. A Hesston Straw Chopper shreds residue from your combine into easy-to-turn-under lengths, and spreads them evenly over the field **as you harvest!** The Hesston eliminates bunching... leaves fields ready for immediate plowing... in some cases even eliminates plowing... saves one or two diskings. Hesston-shredded straw decomposes quickly, returns nitrogen to soil, improves humus, helps soil retain moisture and resist erosion. The Hesston has more satisfied owners than any other straw chopper. The Hesston is ideal in small grains, down or windrowed crops, rice, flax, lespedeza, or weed-infested fields.

there's nothing like a Hesston!

Famous Hesston free-swinging hammers give non-slugging performance. Exclusive reversible features permit easy adjustment for fine or coarse shredding... far or close spreading!

The Hesston Straw Chopper is available for most popular makes of combines.

Find out why HESSTON is the world's most popular Straw Chopper

HESSTON Mfg.Co. Inc.
604 KING ST. / HESSTON, KANSAS

Please send me literature and name of my distributor on the Hesston Straw Chopper to fit a _____ combine. Also on the Hesston Windrower_____ Corn Harvester_____ Soybean Attachment _____ I am a Farmer_____ Dealer_____ Student _____

NAME _____

ADDRESS _____

TOWN _____ STATE _____

SC 25-261

NEW PRODUCTS and SERVICES

STRAW CHOPPER. A new Straw Chopper with a rotor that can be run in either forward or reverse rotation is now flowing off expanded assembly lines at Hesston Manufacturing Co. after extensive field testing.

Lyle E. Yost, president of the company, called this engineering advancement "the answer to widespread customer demands for a more versatile straw chopper."

What is the advantage of reversibility to the man in the field? Yost describes it simply as "triple flexibility," meaning:

1—You can shred your straw fine and spread it far.

2—You can chop it coarse and spread it close.

3—You can strike a medium between the two when desired.

In short, the farmer can set his chopper to do the best job possible under existing crop and field conditions, and the width of spread can be controlled from 12 feet up to 20 feet.

For further information write Soybean Digest 7f, Hudson, Iowa.

MANLIFT. Important safety and operational modifications mark the 1961 model Shanzer Manlift Elevator.

Designed to facilitate movement of individual personnel between any number of floors, the new model features slotted steel channel box guides which serve to "hood" the wheels for absolute protection against "pull out" or untracking.

Shanzer Manlift Elevators are in their 8th year of production and have found a wide range of applications in feed mills, grain elevators and other industrial applications.

For further information write Soybean Digest 7g, Hudson, Iowa.

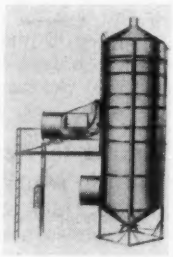
GRAIN SCREENS. A special chemical "bath" has been developed by the S. Howes Co., Inc., to treat the wooden screen frames used in its grain cleaning machines.

The new process utilizes a special chemical that penetrates deep into the pores of the wood, completely eliminating all possibility of warping. In addition, the chemical treatment makes the screen frames resistant to fungus and insect damage.

All S. Howes sales engineers have been provided with samples of the new-type screens.

For further information write Soybean Digest 7b, Hudson, Iowa.

DRIER. The Ace Supply & Equipment Co., announces that due to enthusiastic acceptance by the trade, the Ace High Dryer, which was produced and sold initially in Kansas and Missouri, will be marketed nationally.



Features include expansion capabilities by adding modular elements, push-button operation, and safety shutdown and alarm. Ace High Dryers are available in three sizes from 250 to 600 bushels per hour drying capacity.

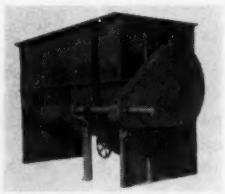
For further information write Soybean Digest 7e, Hudson, Iowa.

SOLVENTS A newly revised solvent folder has been published by American Mineral Spirits Co. This handy file-type folder entitled, "Amsco Solvents," presents products specifications in comparative form.

In addition to typical specifications including distillation ranges, charts present relative time of evaporation. There is information on solvent selection. There is also a brief description of aliphatic naphthas, paraffinic hydrocarbons, odorless solvents and also aromatic and intermediate hydrocarbon solvents.

For copies of "Amsco Solvents" without obligation write Soybean Digest 7a, Hudson, Iowa.

BLENDER. Details of the construction and operation of the Thomas All-Purpose Blender are now available in the new bulletin No. 1160-M, just published by the Thomas Conveyor Co. These mixers are available in many sizes and are custom designed to fit the particular job in many industries.

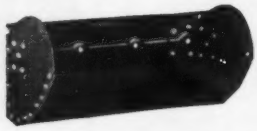


For further information write Soybean Digest 7d, Hudson, Iowa.

MOISTURE RECORDER. Burrows Equipment Co., Evanston, Ill., announces that the equipment leasing plan that it made available to its customers several years ago can be used on purchases of the new Burrows Moisture Recorder. Under this plan payments can be spread over a 3-year period, thus conserving working capital.

For further information write Soybean Digest 7c, Hudson, Iowa.

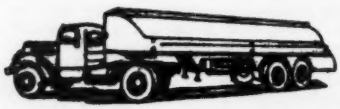
A Sales Record of More Than
15 MILLION
SUPERIOR
ELEVATOR CUPS
DP-OK-CC-V



For Better Results—Longer Life—More Capacity
"Elevator Cups Is Our Business, Not A Sideline"

K. I. WILLIS CORPORATION
MOLINE, ILLINOIS
Telephone Moline 4-6783

Ship By



TANK TRUCK
SOYBEAN OIL HAULING
OUR SPECIALTY
Hopper trucks for bulk soybean oil meal.
STILLPASS TRANSIT CO.
CONTRACT HAULERS
Inter and Intra State Tank Truck Operators . Edible Oils
4967 Spring Grove Avenue Mulberry 1-6102—1-6103
Cincinnati 32, Ohio If no answer call Grandview 1-5529

Soybeans Go on Free List in Japan

Japan. Imported soybeans went on the free list (automatic allocation) in Japan July 1 as originally planned. The dropping of import restrictions on soybeans was confirmed by the Japanese cabinet in extraordinary session June 8.

Trading in U. S. soybeans on all Japanese grain exchanges will follow, with trading to be initiated Sept. 1. Detailed rules for trading in U. S. beans have been adopted by all Japanese grain exchanges, which up to now have traded only in domestic soybeans.

The tariff on imported soybeans will remain at the current 10% rate until an extraordinary meeting of the Diet in early August, when a 13% tariff is expected to be approved.

In the meantime, the Japanese Agriculture-Forestry Ministry is taking steps to protect Japanese soybean growers following the freeing of imports through increasing the subsidy and the price support program. Japan produced only 14.5 million bushels of soybeans in 1960 as compared to 41 million bushels imported.

Observers have been predicting a rapid expansion in imports following automatic allocation. According to the Japanese economic planning board, Japan will need to import 75 million bushels by 1965 and 98 million bushels by 1970.

West Germany. West German imports of soybeans October 1960-February 1961 were down about 1 million bushels from the like 1959-60 period, according to Foreign Agricultural Service, U. S. Department of Agriculture.

Imports from Communist China fell sharply and more than offset increased takings from the United States—up 3 million bushels from the previous years —17.9 million bushels compared with 14.9 million bushels.

About four-fifths of West German imports of 36.7 million bushels in calendar 1960 were from the United States. All German soybean imports are crushed for oil and meal.

Pakistan. Pakistan's production of vanaspati (hydrogenated vegetable oil) in 1960 rose to 34,260 long tons, one-fourth larger than in 1959 and an alltime high.

The increase was possible because of larger imports of cottonseed and soybean oils from the United States under P. L. 480.

Belgium. Belgian imports of oilseeds and vegetable oils in 1960 increased sharply over each of the previous 2 years, but imports of oilseed cakes and meals declined moderately, reports FAS.

Soybean imports, nearly all from the United States, were three-fourths larger than 1959; copra, mostly from the Philippines, increased by one and three-fourths; and castor beans, mainly from Ecuador and Mainland China, were more than double the previous year's takings. Major decreases were in peanuts, palm kernels, and flaxseed.

Peanut oil imports, principally from Argentina, the Republic of the Congo, and China, were up one-half; cottonseed oil imports, largely from the United States, were over three times 1959 tonnage; and soybean oil imports from the United States and the Netherlands more than doubled.

Mainland China. In view of the export importance of soybeans and the unsatisfactory internal supply of cooking oils and protein foods, Communist China probably will strive to maintain soybean acreage at around the 4-million-acre level this year, according to Foreign Agricultural Service, USDA.

Over the long run, and in the circumstances in which Mainland China finds itself, pressures for the expansion of grain acreage will impose relatively inflexible limits on the possibilities for expansion of oilseed acreage, including soybeans.

Exports of soybeans from Communist China, which reached a postwar high of about 59 million bushels in 1959, declined sharply in 1960, reflecting reduced movement to the Soviet Bloc. In view of the serious food shortage in China the total level of foodstuff exports in 1961 undoubtedly will be cut back and soybeans likely will share in this downward trend.

EXPORT ORDERS. U. S. Department of Agriculture announced the following purchase authorizations and agreements for U. S. soybeans and soybean products under Public Law 480 during June:

June 5, an amended Food for Peace agreement with Pakistan providing for sale of $3.75 million worth of cottonseed or soybean oil (about 22 million pounds). The new agreement, which amended a P. L. 480 agreement with Pakistan announced Apr. 11, 1960, provides for payment in Pakistan rupees. Authorizations to be announced later.

June 16, p. a. 15-80 to Pakistan for purchase of up to $3.75 million worth of cottonseed oil or soybean oil from U. S. suppliers. Sales contracts between June 23 and Aug. 31. 1961, shipments between June 23 and Sept. 30, 1961.

June 22, an amendment to a Food for Peace agreement with Greece for sale of an additional $1.9 million worth (about 11 million pounds) of U. S. cottonseed or soybean oil.

June 22, p. a. 26-50 to Greece to purchase up to $1.8 million worth of cottonseed or soybean oil under the above agreement, sales contracts between June 29 and Aug. 31, 1961, shipments between June 23 and Sept. 30, 1961.

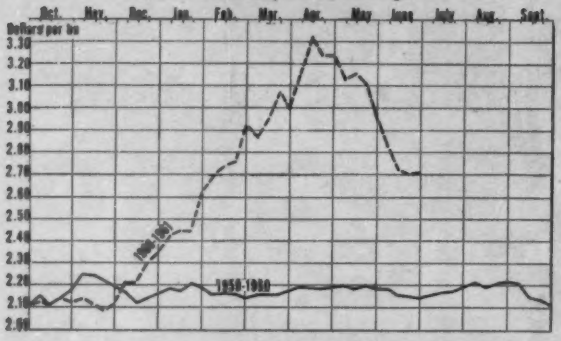
June 26, an amendment to Aug. 1, 1960, Food for Peace agreement with United Arab Republic to finance sale of $1.1 million worth (approximately 6.6 million pounds) of cottonseed or soybean oil.

June 27, p. a. 46-35 to UAR for above, $1.1 million worth of cottonseed or soybean oil, sales to be contracted between July 4 and Aug. 31, 1961, shipments between July 4 and Sept. 30, 1961.

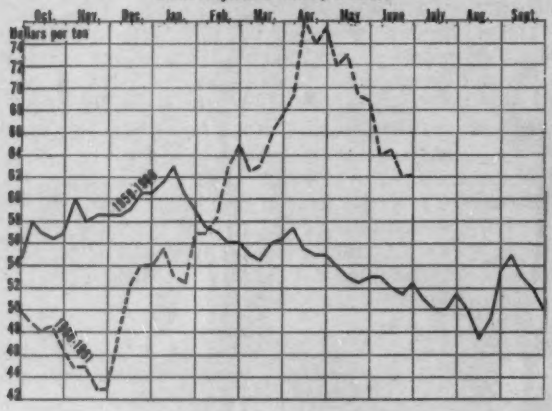
May 31, International Cooperation Administration issued PA 608-050-000-124-1153 and PA 608-050-000-124-1154 to Morocco providing for procurement of $5 million worth of soybean oil or cottonseed oil produced in the United States and shipped from the United States. Contracting period May 19 to Oct. 31, 1961, terminal delivery date Dec. 31, 1961.

TRENDS AT A GLANCE (Weekly Close)

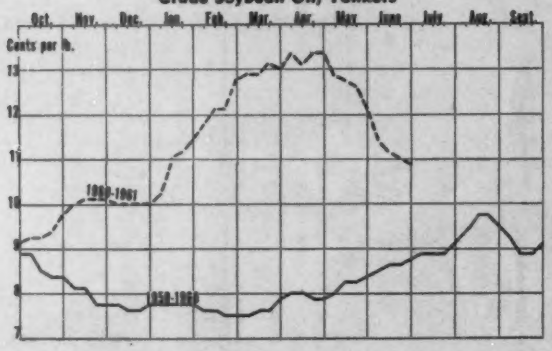
No. 1 Cash Soybeans, Chicago



Bulk Soybean Meal, Decatur



Crude Soybean Oil, Tankers



CASH PRICES, JUNE 1961*

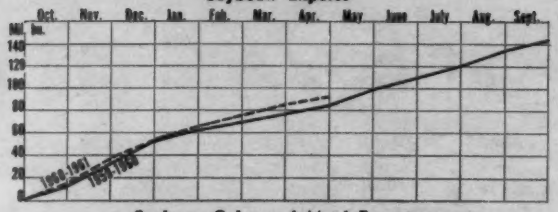
June	No. 1 yellow soybeans Chicago	Bulk soybean meal Decatur	Soybean oil Decatur	Cottonseed oil Mississippi Valley	Coconut oil Pacific Coast	Lard Chicago
1	$3.02¼	$68.00	$.12⅜	$.13¾	$.11½	$.1050
2	3.01¼	67.00	.12⅜	.13¾	.11⅜	.1050
5	3.03½	67.00	.12½	.13⅞	.11⅜	.1025
6	2.97¾	66.00	.12½	.13¾	.11⅜	.1000
7	2.94	64.50	.12¼	.13⅝	.11¼	.1020
8	2.87¾	63.50	.12	.13⅜	.11¼	.1020
9	2.82½	64.00	.11¾	.13¼	.11¼	.1030
12	2.72½	64.00	.11⅜	.13	.11¼	.1025
13	2.71¾	63.50	.11⅜	.13	.11¼	.1000
14	2.78½	64.50	.11½	.13¼	.11¼	.0980
15	2.69¼	64.50	.11⅛	.13	.11¼	.0950
16	2.72	64.50	.11⅛	.13	.11⅜	.0940
19	2.72¼	64.50	.11	.12⅞	.11½	.0930
20	2.69½	64.00	.10⅞	.12¾	.11⅜	.0915
21	2.68¾	63.00	.10¾	.12¾	.11⅜	.0902
22	2.70½	62.00	.10⅞	.12⅜	.11¼	.0907
23	2.67¾	62.00	.11	.13	.11¼	.0930
26	2.63¼	61.50	.10¾	.12⅞	.11½	.0930
27	2.61¾	60.00	.10⅝	.12⅞	.11½	.0930
28	2.63¼	60.00	.10¾	.13	.11½	.0930
29	2.65	61.00	.10⅞	.13¼	.11½	.0930
30	2.70½	62.00	.10⅞	.13⅛	.11½	.0975

* From Wall Street Journal, Chicago.

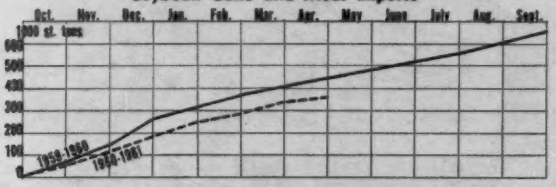
EXPORTS 1959-60 AND 1960-61

Cumulative year beginning Oct. 1

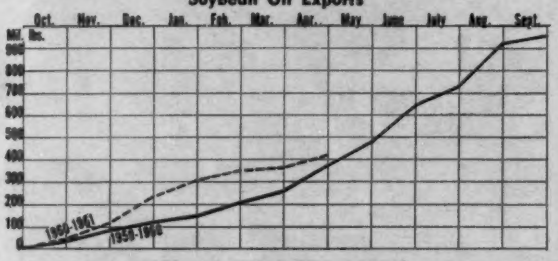
Soybean Exports



Soybean Cake and Meal Exports



Soybean Oil Exports

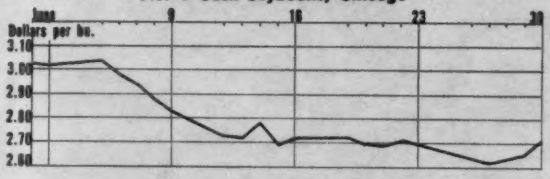


1959 AND 1960 SOYBEAN CROPS

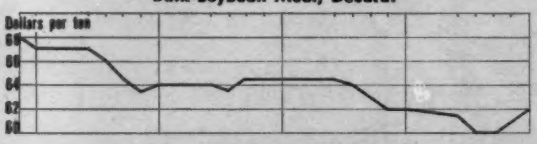
	1960	1959
Total soybeans under price support as of May 31	25,384,329 bu.	52,379,385 bu.
Total soybeans withdrawn from support as of May 31	23,680,067 bu.	22,883,453 bu.
Soybeans delivered to CCC	9,219 bu.	
Soybeans crushed Oct. 1-May 31	285,737,000 bu.	271,773,000 bu.
Exported Oct. 1- May 31	104,575,000 bu.	98,164,000 bu.
Balance on June 1 for processing, export or carryover	156,675,000 bu.	187,355,000 bu.
Total soybeans inspected for overseas exports plus lake shipments to Canada Oct. 1-June 23	109,758,601 bu.	107,607,834 bu.

DAILY MARKET PRICES

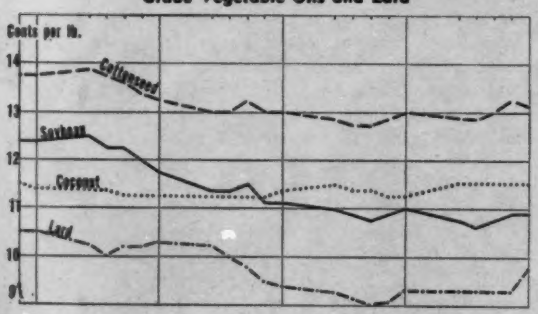
No. 1 Cash Soybeans, Chicago



Bulk Soybean Meal, Decatur



Crude Vegetable Oils and Lard



Good Start for Crop

PLANTING OF THE 1961 soybean crop as of July 1 was about complete except for some acreage to be planted after other crops—mostly in the South—and for some replanting.

Planting was late in Kansas where moisture was ample to excess. A larger than usual acreage was replanted in Nebraska due to washing and flooding. Planting was also late in Indiana and Ohio.

The crop generally came up to a good stand and was being cultivated in late June. Soil moisture through June was adequate most places with exceptions in the Dakotas, Minnesota, Indiana and Ohio. Outlook for weed control was generally good with local exceptions. There was more than the usual amount of pre-emergence spraying.

Canadian soybean acreage will be up as much as 20% to 25% over the 1960 acreage of 257,000, USDA reports. This would be the first sizable increase in several years and a new record.

Reports from Soybean Digest correspondents:

Arkansas. George L. Morris, associate county agent, Blytheville (6-19): Crop planted about 20 days later than usual but at a good planting date. Slight increase in acreage due to flood conditions. Soybeans are growing rapidly but somewhat shorter than usual.

Florida. E. N. Stephens, county agent, Pensacola (6-20): Approximately 50% yet to be planted, normal. 3% increase in acres. Abundant soil moisture. Crop condition very good.

Indiana. J. B. Edmondson, Danville (6-18): Planting averages 10 days late. Due to cloddy, dry planting time, late planting, weeds, would rate condition low. I would expect great improvement later. Looks like we're in for a bad weed year. Alanap is making a good showing.

Louisiana. Mark H. Brown, Lake Providence (6-19): Planting perhaps a little late. Overall crop better than normal.

Minnesota. Howard E. Grow, Farmer Seed & Nursery Co., Faribault (6-17): Planting date normal. Need rain badly. Crop condition average. Will suffer unless we have rain soon. Weeds bad some fields.

Missouri. Jim Pitts, St. Joseph (6-17): Our soybeans are the nicest, cleanest I can remember. Only a few have any foxtail-grass problem. County average yield could be 35 bu. per acre. I have 575 acres and intend to plant about 20 more.

Ohio. David G. Wing, Mechanicsburg (6-20): West central Ohio acreage increase 10% to 20%. There are soybeans in every little field and garden. Early beans are looking good. A rain now will make a good stand almost everywhere. Most beans fairly clean.

Lewis C. Saboe, Ohio State University, Columbus (6-19): Too much cool weather earlier. Stands generally okay. Development week to 2 weeks behind time. Fields cleaner than usual at this time.

South Carolina. H. P. Perrow, Cameron (6-17): Planting at normal date. Plenty of moisture. Crop a little slow getting off.

Virginia. Louis Groh, Louis Groh & Son, Clay Bank (6-17): Moisture supply very good, also condition of crop and weed control very good.

Ontario. R. H. Peck, River Canard (6-19): Acreage up 15% from 1960. Practically all planted and a satisfactory stand. Crop condition normal with better than normal prospects for weed control. Dry warm weather giving chance to do timely rotary hoeing. Moisture supply a little below normal.

Chipperfield Reelected Head of Oilseed Crushers

GUY CHIPPERFIELD, Great Britain, was reelected president of the International Association of Seed Crushers for the 11th successive year at the 39th congress at Stockholm June 6-9.

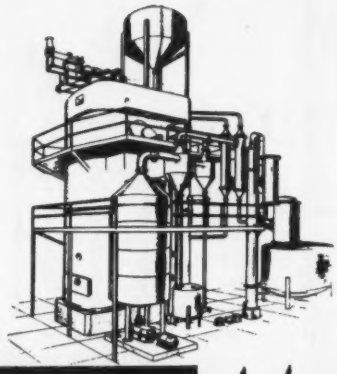
E. Griffiths, France, was elected senior vice president. C. A. C. de Boinville, Great Britain, was elected second vice president; and A. E. Peel, Great Britain, was reelected secretary.

The French Seed Crushers will be hosts for next year's congress which will be held in Cannes June 5-8.

MODEL 300 LOS Steinlite
FAT & OIL TESTER
For rapid electronic measurement of fat and oil content of soybeans, flax, peanuts, cottonseed, expeller meal, meat and meat products and other fat and oil bearing products.
Proved by many satisfied customers
• Rapid Tests
• Simple Operation
• Accurate Fat or Oil Determinations
Now you can make rapid, easily made and accurate fat and oil content determinations on all fat and oil bearing products. Soybean processors say that non-technical personnel can make tests at ½ the cost and 1/20 the time—with, plus or minus, .5 of 1% of the accuracy determined by official laboratory methods. Write for complete information.
"World's leading Supplier of Grain Testing Equipment for Over 40 Years"
SEEDBURO
(SEED TRADE REPORTING BUREAU)
EQUIPMENT COMPANY
Dept. SD-9 618 W. Jackson Blvd., Chicago 6, Ill.

SOLVENT EXTRACTION SYSTEMS

The country's leading processors of oil seeds have specified French Solvent Extraction Equipment again and again because of its versatility—ease of operation — economy — efficiency — safety — and finer and more profitable end products — all at no extra cost.

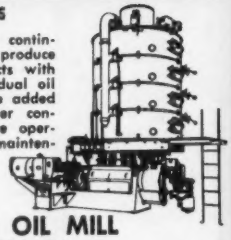


FRENCH

SPECIALISTS IN OIL MILLING EQUIPMENT SINCE 1900

SCREW PRESSES

High capacity French continueus screw presses produce highest quality products with exceptionally low residual oil in meal . . . plus the added benefits of low power consumption and full-time operation with minumum maintenance.



- French Rolls
- Box Presses
- Formers
- Valves
- Pumps
- Accumulators

THE FRENCH OIL MILL MACHINERY CO.

PIQUA, OHIO U.S.A. F012

The Best Buy for $65 Since the Indians Sold Manhattan Island

An advertisement this size in the Special Convention (Sept.) issue of THE SOYBEAN DIGEST may not take up much space but it's a *BIG* investment. It reaches the prospect when he's ready to buy . . . and knows what he's looking for. The question is no longer what . . . but *WHO.*

THE SOYBEAN DIGEST covers the soybean industry like a blanket . . . the fastest growing agricultural commodity in America.

One of the following palefaces will be more than happy to discuss this issue with you: Art Hutchison, Dave Hanley, Bob Smythe — 228 N. LaSalle, Chicago, Illinois—STate 2-2911: Jack O'Donnell, 153 Seaman Ave., New York 34, N.Y. — LO 7-5010: Dave Bramson — Hudson, Iowa — TAylor 5-3296.

IN THE MARKETS

PROCESSING OPERATIONS. Reported by Bureau of the Census for April and May 1961.

Primary products except crude oil at crude oil mill locations: Production, shipments and transfers, and stock, May 1961—April 1961 (1,000 short tons)

	Production		Shipments and transfers		Stocks end of month	
	May 1961	April 1961	May 1961	April 1961	May 31, 1961	April 30, 1961
Soybean:						
Cake and meal	781.1	758.9	782.9	721.0	212.5	216.3
Millfeed (hull meal)	17.4	14.9	15.9	13.7	10.4	8.9

Soybeans: Net receipts, crushings, and stocks at oil mills, by states, May 1961-April 1961 (1,000 short tons)

	Net receipts at mills[1]		Crushed or used		Stocks at mills	
	May 1961	April 1961	May 1961	April 1961	May 31, 1961	April 30, 1961
U. S.	445.4	676.0	1,028.9	988.9	2,023.9	2,607.4
Arkansas	(2)	(2)	(2)	(2)	(2)	(2)
Illinois	149.3	211.1	296.0	291.4	460.9	607.6
Indiana	57.1	72.4	95.1	73.5	194.1	232.0
Iowa	114.9	168.2	182.1	172.3	258.8	325.9
Minnesota	40.8	51.9	56.4	55.2	108.5	124.2
Mississippi	(3)	5.7	41.3	47.3	43.0	87.8
Missouri	(2)	(2)	(2)	(2)	(2)	(2)
Nebraska	(2)	(2)	(2)	(2)	(2)	(2)
North Carolina	3.7	2.7	18.9	16.1	51.9	67.1
Ohio	30.6	53.2	83.3	85.4	169.3	222.0
Tennessee	11.6	13.4	77.7	67.5	236.6	302.7
All other	37.4	97.4	178.1	180.2	500.8	638.1

Note: Detail figures may not add to totals because of independent rounding. [1] Net receipts for each state are derived from the quantity of beans crushed and net change in stocks. [2] Included in "All other" to avoid disclosure of figures for individual companies. [3] Receipts exceeded by reshipments out of previously acquired stocks.

Soybean products: Production and stocks at oil mill locations, by states, May 1961-April 1961

	Crude oil (millions of pounds)				Cake and meal (1,000 tons)[1]			
	Production		Stocks		Production		Stocks	
	May 1961	April 1961	May 31, 1961	April 30, 1961	May 1961	April 1961	May 31, 1961	April 30, 1961
U. S.	377.0	362.9	117.4	112.6	798.5	773.8	222.9	225.2
Arkansas	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Illinois	110.7	110.0	37.6	37.1	221.2	222.3	64.5	63.3
Indiana	34.7	26.3	(2)	7.1	75.8	58.2	(2)	(2)
Iowa	65.4	62.0	12.3	17.8	146.7	139.0	34.4	35.7
Minnesota	20.7	19.9	7.5	5.6	43.8	42.8	3.3	5.5
Mississippi	15.0	17.2	3.8	3.9	31.2	35.8	7.5	10.8
Missouri	(2)	(2)	(2)	(2)	(2)	(2)	(2)	5.5
Nebraska	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
N. Carolina	6.5	5.5	2.3	1.9	15.0	12.7	2.6	2.5
Ohio	29.3	31.1	12.0	7.7	64.1	69.0	5.0	7.5
Tennessee	29.6	25.2	12.3	9.7	59.8	52.9	8.2	6.8
All other	65.1	65.7	29.6	21.8	140.9	141.1	97.4	87.6

Note: Detail figures may not add to totals because of independent rounding. [1] Includes mill feed (hull meal). [2] Included in "All other" to avoid disclosure of figures for individual companies.

FACTORY USE VEGETABLE OILS for March and April 1961. Reported by Bureau of the Census.

Selected edible oils: Production, consumption, and factory and warehouse stocks (million lbs.)

	Cottonseed oil		Soybean oil	
	Apr. 1961	Mar. 1961	Apr. 1961	Mar. 1961
Production:				
Crude oils	137.7	163.5	362.9	381.1
Refined oils (once refined)[1]	138.2	166.9	291.2	*319.5
Consumption in refining[1]	149.1	181.2	301.8	*332.4
Consumption in selected edible and inedible produces, total[2]	107.8	*128.6	261.8	*296.1
Consumption in edible products, total	107.3	*128.2	245.5	*278.9
Baking or frying fats	30.6	38.3	86.0	102.8
Salad or cooking oil	63.0	* 72.1	78.4	* 90.8
Margarine	12.6	16.7	79.0	82.5
Other edible products[3]	1.1	1.1	2.1	2.8
Stocks, end of month, total[2]	432.6	*447.6	680.4	*624.7
Crude oils	96.8	134.8	461.4	*429.2
Refined oils	335.8	*312.8	219.0	*195.5

* Revised. [1] Production of refined oils covers only once-refined oil. Degummed soybean oil is reported as crude oil. [2] Includes hydrogenated fats and other fats and oils "in process," (e.g. refined cottonseed includes stocks of stearin). [3] Includes confectioners fats.

IN THE MARKETS

PRICES. Average price for soybeans received by farmers, effective parity, and support rates, reported by Agricultural Marketing Service (dollars per bushel).

Average farm price			Effective parity	Av. price as percent of parity	National average price support rate		
May 15, 1961	Apr. 15, 1961	May 15, 1960	May 15, 1961	May 15, 1961	1961 crop	1960 crop	1959 crop
2.96	3.02	2.00	2.90	102	2.30	1.85	1.85

Average farm and parity prices from crop reporting board.

Soybean prices compared with market value of soybean oil and meal

	Soybean oil		Soybean meal		Value of oil and meal from bushel of soybeans[1]	Market price No. 1 yellow soybeans Ill. pts.	Spread between soybean price and value of oil and meal
	Average price at crushing plant	Value from bu. of soybeans[1]	Bulk price at Decatur	Value from bu. of soybeans[1]			
	Cts. per pound	Dollars	Dollars per ton	Dollars	Dollars	Dollars per bu.	Cents
May 1961[2]	12.7	1.40	71.60	1.68	3.08	3.09	—1
Apr. 1961	13.4	1.47	73.10	1.72	3.19	3.14	5
Mar. 1961	13.0	1.43	64.45	1.51	2.94	2.88	6
Feb. 1961	12.1	1.33	61.50	1.45	2.78	2.66	12
Jan. 1961	10.8	1.19	55.20	1.30	2.49	2.39	10
May 1960	8.2	.90	54.20	1.27	2.17	2.09	8

[1] Based on assumption that a bushel of soybeans yields 11.0 pounds of oil and 47.0 pounds of meal. [2] Preliminary. This table is for statistical comparison only. It does not reflect actual operating margins since prices are simple averages and do not take into account location differentials or actual purchases and sales of soybeans, soybean oil or soybean meal. From USDA's Agricultural Marketing Service.

MELLORINE. Production of mellorine and other frozen desserts made with fats and oils other than milkfat in the United States in May totaled 5,125,000 gallons, according to the USDA crop reporting board. This was 16% more than in May a year earlier and 37% greater than the 1955-59 average for the month. Output the first 5 months of this year totaled 19,380,000 gallons.

Production of "mellorine-type" frozen desserts, United States, 1961

	1955-59 average[1]	1959[1]	Estimated 1960	1961	Change from: 1955-59 av.	1960
	Thousand gallons				Percent	
January	2,016	2,273	2,595	2,900	+44	+12
February	2,192	2,464	2,920	3,205	+46	+10
March	2,810	3,360	3,400	4,040	+44	+19
April	3,079	3,618	3,915	4,110	+33	+5
May	3,729	4,173	4,405	5,125	+37	+16
5-month total	13,826	15,888	17,235	19,380	+40	+12

[1] From enumerations.

PRICE SUPPORT. U. S. price support operations, 1951 to date, reported by U. S. Department of Agriculture.

Soybeans: U. S. price support operations, 1951 to date

	Production	Quantity put under support	Percent of crop	Deliveries by crop to CCC	Carryover stocks[1] Total	Carryover stocks[1] Owned by CCC	Average support rate	U.S. farm price
	1,000 bushels	1,000 bushels	Percent	1,000 bushels	1,000 bushels	1,000 bushels	Dollars per bu.	Dollars per bu.
1951-52	283,777	11,133	3.9	57	4,161	1	2.45	2.73
1952-53	298,839	14,098	4.7	3,858	3,589	1	2.56	2.72
1953-54	269,169	31,790	11.8	7	10,134	1,980	2.56	2.73
1954-55	341,075	41,413	12.1	15,550	1,345	13	2.22	2.46
1955-56	373,522	30,133	8.1	2	9,949	6,570	2.04	2.22
1956-57	449,446	65,729	14.6	27,315	3,731		2.15	2.18
1957-58	483,715	90,552	18.7	44,509	9,897	5,166	2.09	2.07
1958-59	579,713	140,205	24.2	83,000	21,083	13,882	2.09	2.00
1959-60	533,175	52,386	9.8	3,845	62,117	44,240	1.85	1.96
1960-61	558,778	25,500	4.6	1,000	23,209	9,665	1.85	2.00

Commodity Stabilization Service, grain division, USDA.

Soybeans: CCC dispositions[1] (1,000 bu.)

Domestic sales and dispositions		By ASC county offices	
By CSS commodity offices		Non-storable bin site	3
Non-storable track and term	2	Statutory minimum[2]	794
Statutory minimum[2]	7,542	Total domestic	8,346
Other domestic	5	Total export	0
		Total dispositions	8,346

[1] Oct. 1, 1960-June 2, 1961. [2] Sold for domestic or export use at announced prices. [3] Sales under Payment-in-Kind Program; not applicable to soybeans.

IN THE MARKETS

EXPORTS. Preliminary data on U. S. exports of soybeans, soybean and cottonseed oils, and soybean and cottonseed cakes and meals for April 1961, with comparable data for April 1960 and cumulative totals for October-April in the marketing years 1959-60 and 1960-61, by USDA's Foreign Agricultural Service.

	Unit	April 1960[1]	April 1961	October-April[1] 1959-60	October-April[1] 1960-61
Soybeans	bu.	8,126,932	7,651,293	83,896,994	92,575,469
Soybean oil:					
Crude	lb.	80,371,429	41,303,642	239,767,790	290,485,436
Refined but not further processed	lb.	3,174,626	3,386,040	42,994,172	31,912,355
Refined, deodorized and hydrogenated	lb.	16,428,959	15,851,712	82,512,900	100,165,064
Cottonseed oil:					
Crude	lb.	30,130,009	33,292,671	244,700,244	167,461,938
Refined but not further processed	lb.	15,042,018	25,211,811	122,584,606	60,189,422
Refined, deodorized and hydrogenated	lb.	4,704,462	8,210,823	21,554,294	30,340,198
Cottonseed cake and meal	s.t.	3,059	376	122,597	36,579
Soybean cake and meal	s.t.	29,786	21,015	441,879	359,533

[1] Includes any revisions made by the Bureau of the Census.

Soybeans: Inspections for export by ports and areas, May 1961 (1,000 bu.)

Lake Ports		Gulf	
Duluth	718	Mobile	552
Superior	1,389	New Orleans	3,303
Chicago	938	Port Allen	1,760
Saginaw	180	Subtotal	5,615
Toledo	2,152		
Milwaukee	56	**Pacific**	
Subtotal	5,433	San Francisco	1
Atlantic		Subtotal	1
Philadelphia	49	Totals	
Baltimore	500	May 1961	11,950
Norfolk	352	Jan.-May '61	48,669
Subtotal	901	Jan.-May '60	43,721

Based on weekly reports of inspections for export by licensed inspectors and does not include rail and truck movement to Canada or Mexico. Agricultural Marketing Service.

Soybeans: Inspections for export by coastal areas and country of destination, May 1961 (1,000 bu.)

Lake Ports		Gulf	
Canada	3,883	Netherlands	612
Netherlands	1,037	Belgium	213
Belgium	13	West Germany	228
West Germany	299	Italy	561
Other	201	Korea	316
Subtotal	5,433	Japan	3,476
Atlantic		Other	209
Netherlands	53	Subtotal	5,615
France	112	**Pacific**	
West Germany	191	Other	1
Taiwan (Formosa)	457	Subtotal	1
Other	88	Grand total	11,950
Subtotal	901	Total Jan.-May '61	48,669
		Total Jan.-May '60	43,721

Based on weekly reports of inspections for export by licensed inspectors and does not include rail or truck movement to Canada or Mexico. In some cases, the ultimate destination of the soybeans is not shown on the inspection reports. Therefore, the quantity for each country may vary from official Ceneus data which are based on custom declarations. USDA's Agricultural Marketing Service.

Soybean cake and meal: U. S. exports by country of destination, October-April 1960-61 and 1959-60 (tons)

	Soybean cake and meal Oct. 1960-Apr. 1961	Soybean cake and meal Oct. 1959-Apr. 1960		Soybean cake and meal Oct. 1960-Apr. 1961	Soybean cake and meal Oct. 1959-Apr. 1960
Canada	96,681	115,731	Belgium and Luxembourg	41,367	58,806
Mexico	9,004	7,934	France	17,829	8,390
Cuba	5,300	11,778	West Germany	40,456	58,828
Venezuela	3,527	4,013	Spain	220	24,572
Sweden	30	2,044	Italy	6,459	27,866
Norway	9,879	9,150	Australia	5,051	—
Denmark	27,937	9,863	Philippines	10,476	6,866
United Kingdom	202	990	Japan	25,854	295
Ireland	—	1,653	Other	13,507	29,560
Netherlands	46,974	63,540	Total	360,753	441,879

Bureau of the Census.

Exports under Title I, Public Law 480, July 1960-May 1961

	May 1961 Metric tons	May 1961 Pounds	July 1960-May 1961 Metric tons	July 1960-May 1961 Pounds
Cottonseed oil	8,866	19,547,000	37,292	82,214,000
Soybean oil	2,643	5,827,000	239,274	527,508,000

Foreign Agricultural Service, U. S. Department of Agriculture.

INSPECTIONS. Inspected soybean receipts, by grades and percent, reported by Agricultural Marketing Service.[1]

	May 1961[2] 1,000 bu.	Pct.	April 1961 1,000 bu.	Pct.	May 1960 1,000 bu.	Pct.	Oct. 1960-May 1961 1,000 bu.	Pct.	Oct. 1959-May 1960 1,000 bu.	Pct.
No. 1	3,640	25	6,113	30	6,029	20	93,825	26	58,786	19
No. 2	7,025	49	8,570	42	16,370	55	168,658	46	159,989	50
No. 3	2,782	19	3,743	19	5,144	18	69,535	19	69,920	22
No. 4	734	5	1,453	7	1,509	5	25,279	7	19,707	6
Sample	215	2	386	2	589	2	7,976	2	8,796	3
Total	14,396	100	20,265	100	29,641	100	365,273	100	317,198	100

[1] Carlot receipts have been converted to bushels on the basis that 1 carlot equals 1,800 bushels. [2] Of the May receipts all were yellow soybeans. Inspections of soybeans in May included 3,993,000 bushels as cargo lots, 1,309,000 bushels as truck receipts, and the balance as carlot receipts. Based on reports of inspections by licensed inspectors at all markets.

SUPPLY, DISTRIBUTION of soybeans for the 1957-60 crop years, from Agricultural Marketing Service (1,000 bushels).

	1960-61	1959-60	1958-59	1957-58
Carryover, Oct. 1	23,209	62,117	21,083	9,897
Production	558,778	533,175	579,713	483,715
Total supply[1]	581,987	595,292	600,796	493,612
Farm use, including seed for season:	35,000	38,000	28,000	34,000
Quantity remaining for processing, export, or carryover	546,987	557,292	572,796	459,612
Disappearance, Oct. 1 through May:				
Crushed for oil or processed[2]	285,737	271,773	279,069	238,458
Exported	[3]104,575	98,164	79,406	65,875
Total	390,312	369,937	358,475	304,333
Balance on June 1 for processing, export, or carryover	156,675	187,355	214,321	155,279

[1] Imports not included because negligible. [2] No allowance is made for new-crop crushings prior to Oct. 1. [3] Estimated.

OILSEED MEALS. Production, stocks, foreign trade, and domestic disappearance.

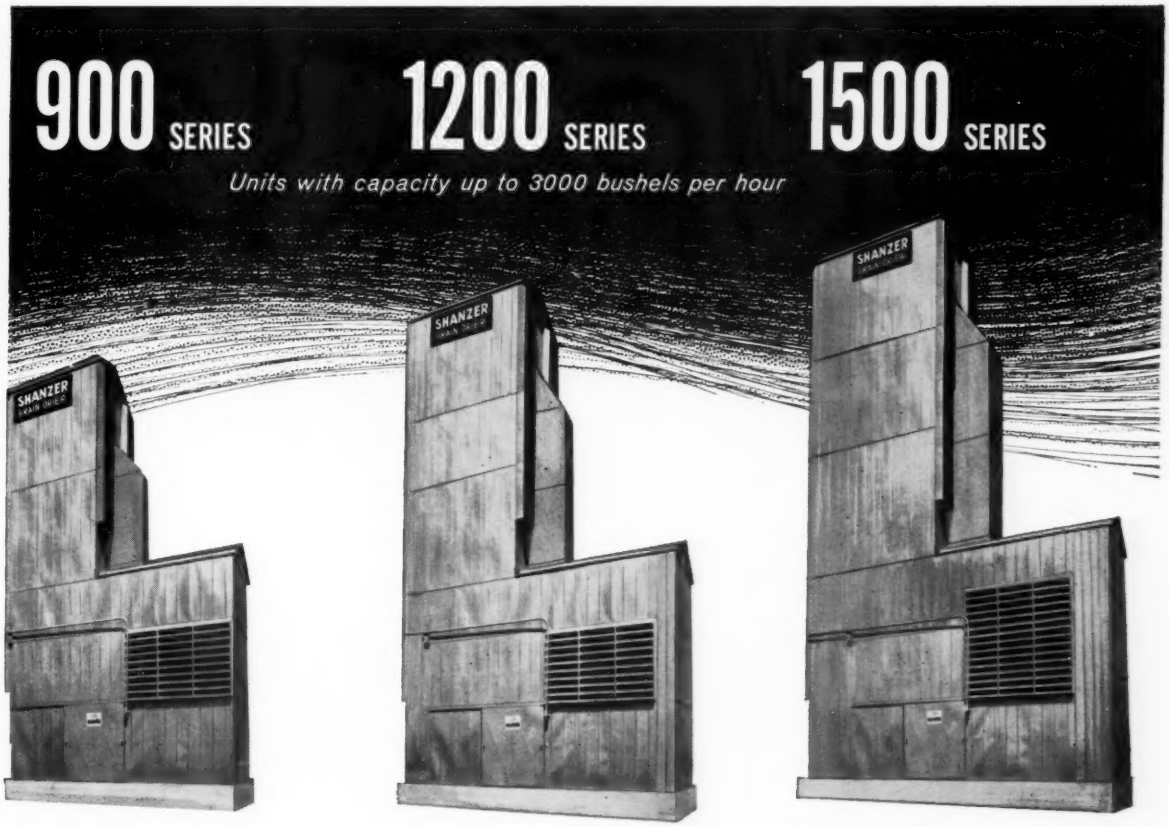
Oilseed meals: Production, stocks, foreign trade, and domestic disappearance—October-April 1959-60 and 1960-61 (1,000 tons)

	Stocks[1] Oct. 1	Production	Imports[2]	Exports	Domestic disappearance	Stocks[1] April 30
			October 1960-April 1961			
Soybean	82.8	5,887.0	0	360.8	5,383.8	225.2
Cottonseed	137.1	1,957.0	22.9	36.6	1,890.9	270.5
Linseed	29.4	229.7	1.2	26.2	214.6	19.5
Copra	6.0	79.1	3.8	—	88.4	0.5
Peanut	1.8	48.7	—	—	47.3	3.2
Total	257.1	8,201.5	27.9	423.6	7,544.0	518.9
			October 1959-April 1960			
Soybean	58.5	5,508.9	0	441.9	4,997.5	128.0
Cottonseed	97.0	1,980.0	27.4	122.6	1,792.9	188.9
Linseed	33.3	241.6	1.9	48.7	178.2	49.9
Copra	0	72.9	4.5	—	77.4	0
Peanut	1.8	36.0	—	—	32.9	4.9
Total	190.6	7,839.4	33.8	613.2	7,078.9	371.7

	Stocks[1] Apr. 1	Production	Imports[2]	Exports	Domestic disappearance	Stocks[1] April 30
			April 1961			
Soybean	186.1	773.8	0	21.0	713.7	225.2
Cottonseed	272.0	189.3	1.0	0.4	191.4	270.5
Linseed	19.9	33.8	0.2	0	34.4	19.5
Copra	0	8.3	1.0	—	8.8	0.5
Peanut	5.2	8.1	—	—	10.1	3.2
Total	483.2	1,013.3	2.2	21.4	958.4	518.9
			April 1960			
Soybean	89.5	767.9	0	29.8	699.6	128.0
Cottonseed	140.8	175.8	3.3	3.1	127.9	188.9
Linseed	48.2	26.6	0.1	0.4	24.6	49.9
Copra	0	11.9	2.1	—	14.0	0
Peanut	4.5	5.4	—	—	5.0	4.9
Total	283.0	987.6	5.5	33.3	871.1	371.7

Note: Dash indicates data are not available. [1] Stocks at processing plants only. [2] Partly estimated. From USDA's Agricultural Marketing Service.

THERE'S A
SHANZER DRIER
THAT'S RIGHT FOR YOU



Small to Medium Operations

Five performance packed models comprise the *"900 SERIES"*. Every unit incorporates the proven features that make Shanzer the most advanced grain drier in the world: Vertical screen column design; completely enclosed unit; and new *Drier Control Center* for maximum safety and ease of operation. Small or large, Shanzer Driers are built from experience to give you the most for your money.

Medium-Sized Operations

The precision engineering and full-rated performance of Shanzer Driers meet heavier schedules with trouble-free, profit-making ease. The *"1200 SERIES"*, like all Shanzer Driers, can be exactly adapted to your particular production flow, fuel preference, and space requirements. Full-time staff specialists are ready to help you plan a more profitable drying operation.

Large Operations

Whatever your drying load or expansion requirements, the new line of Shanzer Driers, like those in the *"1500 SERIES"*, are engineered to deliver the reserve stamina and tremendous capacity giant production loads demand. We invite your inquiry for names and locations of these installations. You'll see that year in and year out, big drying capacity and big value mean Shanzer.

The model that's just right for your operation will depend on grains most frequently handled, typical weather conditions and planning for additional capacity. Call your Shanzer representative for full details and planning assistance.

Send for free folder ➡

Go with Shanzer in the Sixties

SHANZER MANUFACTURING COMPANY

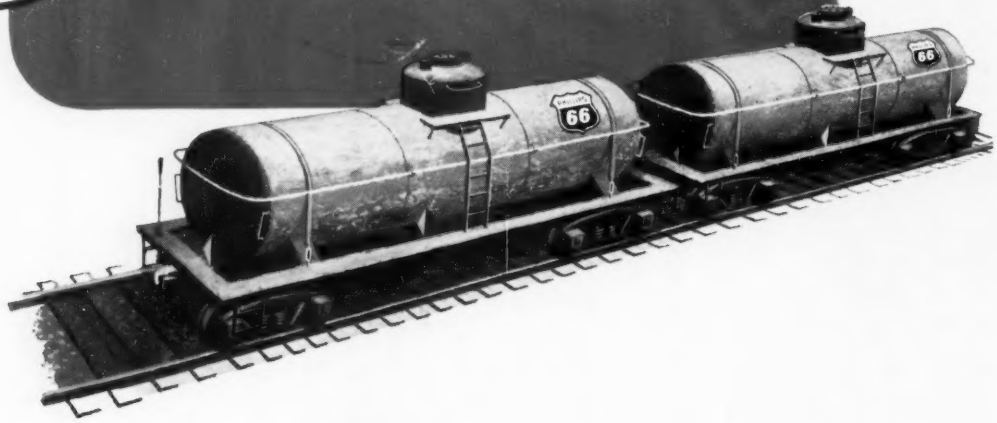
Designer and manufacturers of stationary and portable Grain Driers, Bucket Elevators, Conveyors, Aspirating Cleaners and Manlift Elevators.

85 Bluxome Street • San Francisco 7, California • Phone SUtter 1-5200

UNIVERSITY MICROFILMS
313 N. FIRST ST.
ANN ARBOR, MICHIGAN

PHILLIPS 66

HIGH PURITY* NORMAL Hexane



UNEQUALED IN QUALITY

A minimum normal hexane content of 85% . . . typical benzene and sulfur contents of 0.1% and 10 parts per million respectively—these guaranteed specifications make Phillips High Purity Normal Hexane the highest quality solvent available for oil seed processing. In addition, this premium oil extraction solvent offers you these exclusive features and cost-cutting benefits:

- **Minimum Light and Heavy Components.**
  - —Narrow boiling range
  - —Improved recovery from oil and meal
- **Lower Specific Gravity.**
  - —Less heat needed to vaporize
  - —Less cooling for condensation
- **Uniform Quality.**
  - —Minimum variation in product composition
  - —Improved over-all plant operations

Many convenient shipping points and dependable traffic control assure on-time delivery. Complete information and samples on request.

***85% Minimum Normal Hexane Content**

PHILLIPS 66

PHILLIPS PETROLEUM COMPANY
Special Products Division
Bartlesville, Oklahoma • Phone: FEderal 6-6600

Other solvents available from Phillips: Isopentane • Normal Pentane • Isohexanes
Isoheptanes • Normal Heptane • Isooctanes • AOCS and USP Petroleum Ethers